Amateur Radio

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JOURNAL OF THE WIRELESS INSTITUTE OF AUSTRALIA

- ★ ANTENNA TUNER ADJUSTMENT
- ★ ANOTHER 2 METRE AMPLIFIER
- ★ A NEW TOWER DESIGN
- ★ CHITARY'S MELBOURNE

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ARTICLES

DEPARTMENTS

Cover Photo

Reg VK1BR and Charlene VK1NEJ
(See story "Forward Bias", page 35)
Photo: J. JORDAN, Canberra.

How to squeeze the last ounce out of your Amateur Station.

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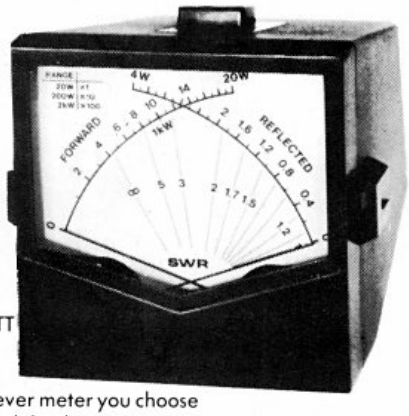
SWR/PWR Meters. Daiwa CN520 $62



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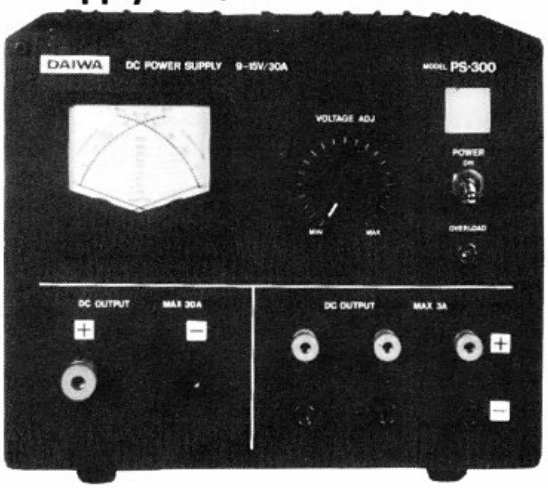
PS-300 Daiwa Lab Power Supply 22A, 9-15V X-Needle



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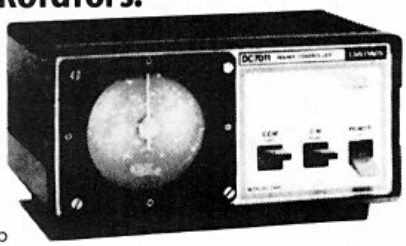

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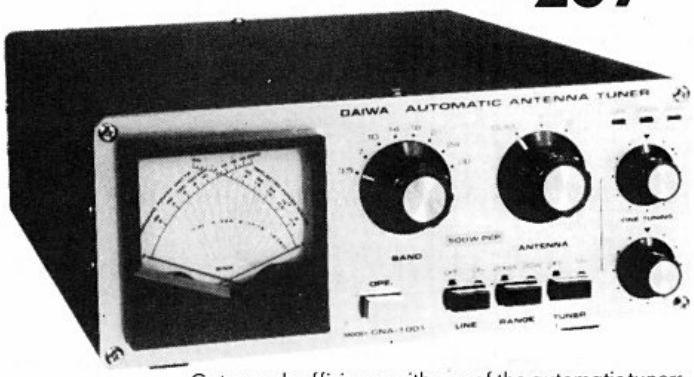

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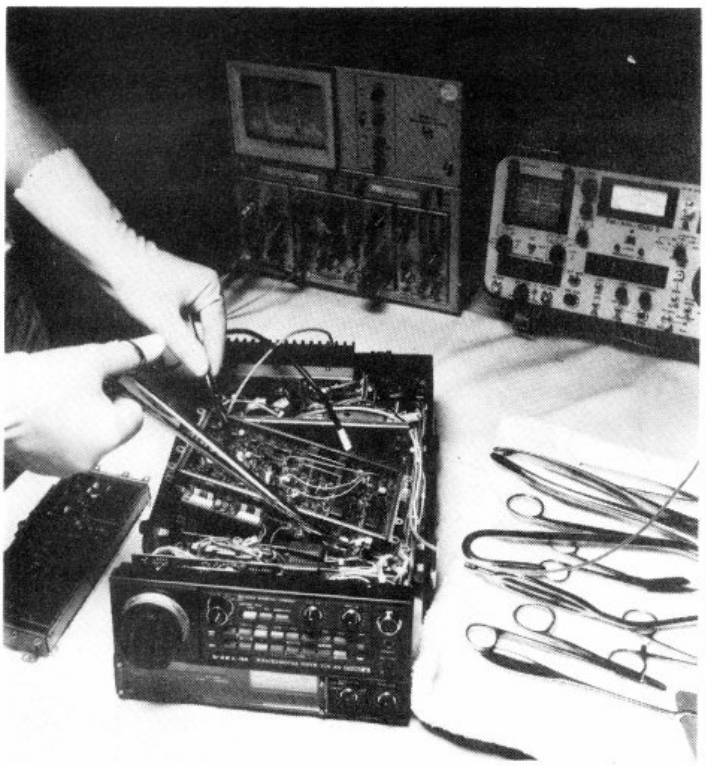

Of course not!

When it comes to your own health, you find the most skilful specialist with all the most sophisticated up-to-the-minute equipment.

It should be the same with electronic equipment.

Firstly, we test all the sophisticated gear we sell before you take it away. That way we try and make sure you buy a rig that's not going to break down.

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WIANEWS

AWARDS

The Federal Awards Manager's work will have changed hands by the time you read this. Bill Verrall VK5WV, took over these duties from Brian Austin VK5CA, three years ago and believes it is time for somebody else to carry on. Fortunately a volunteer came forward in the person of Mike Bazeley VK6HD. Many will remember the excellent DX column in AR by Mike around two years ago. All good wishes, Mike.

BADGES

The WIA NSW Division has arranged the production of "car badges". A sample has been seen and the quality is excellent — probably so good that many members might wish to have one for display in the shack. The design is the traditional map of Australia and 'wings'. Write to the VK2 Division for details.

WIA BOOK

Work on the WIA Book is running behind schedule due to pressures of work at this time of the year. The contents are ready in draft and should go to the typesetters very soon.

QSL CARDS

Whilst discovering problems of the costs incurred by the Federal QSL Manager concerning the disposal of inwards QSL cards to non-WIA members, the Executive resolved to follow the IARU Miscellaneous Rule on the subject which reads: "Member societies shall agree to accept QSL cards addressed to non-members of the national society, provided that such non-members collect or pay for the reforwarding of the cards to them". ■

QSP

Federal Income and Expenditure Budget

Income
Expenditure

Finance — most of us shudder at the word. You and I don't get enough. Everybody else gets too much.

Each annual convention the Federal Finance Committee presents in the form of a budget the estimates of income and expenditure of the Executive office for the following year.

The budget is revised in August and the figures provide the basis of setting Federal dues receivable from Divisions for the next year and in turn enables Divisions to decide on their subscription rates for their members.

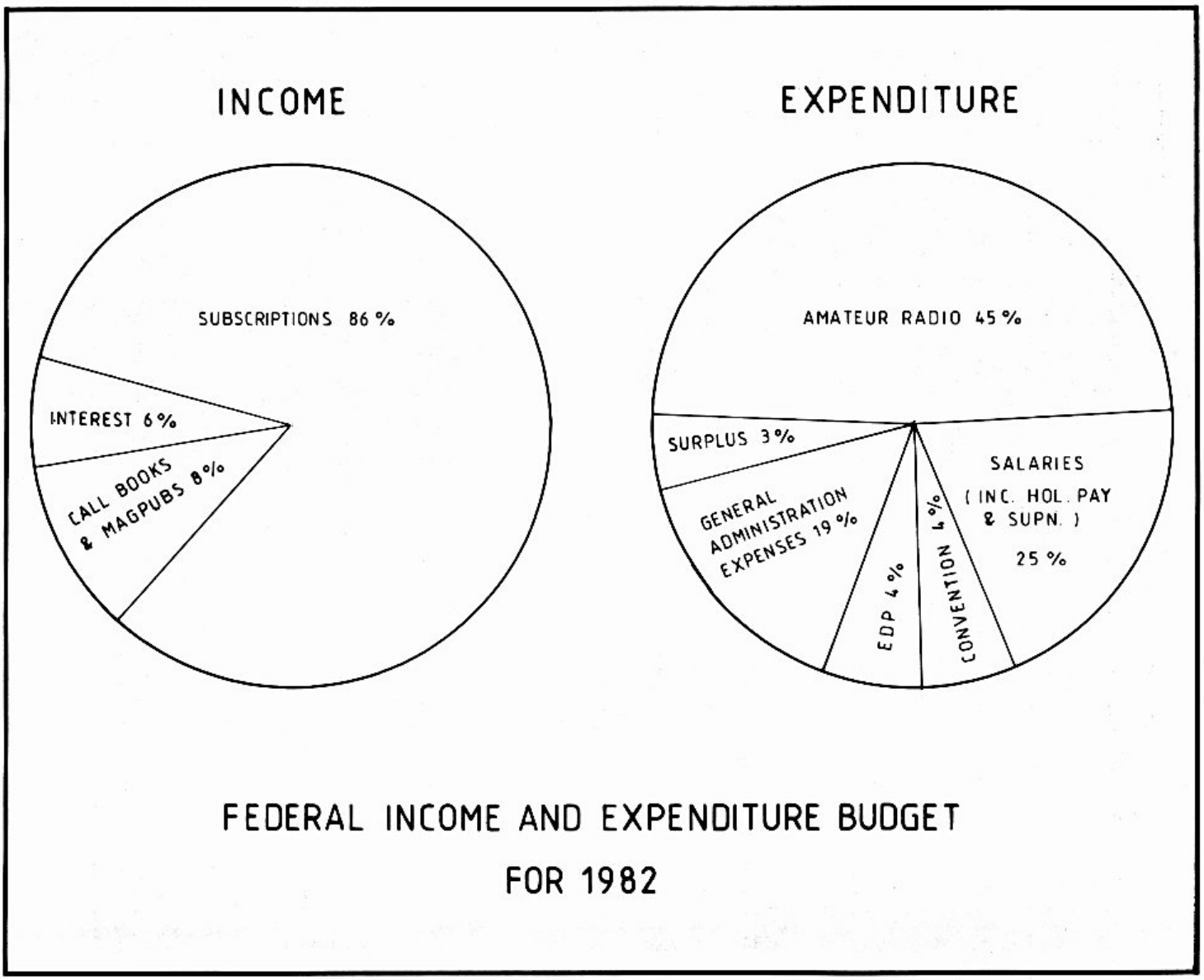
It is readily appreciated that the major expenditure of the Executive office is the publication of "Amateur Radio".

But this is not the only factor.

Our members know that without a central office, professionally administered, to co-ordinate and deal with Federal matters and major issues with one voice then our hobby facilities would soon degenerate in this day and age.

We wish that more non-member amateurs would share the cost with us.

Courtney Scott VK3BNF,
Federal Treasurer. ■



FEDERAL INCOME AND EXPENDITURE BUDGET

FOR 1982

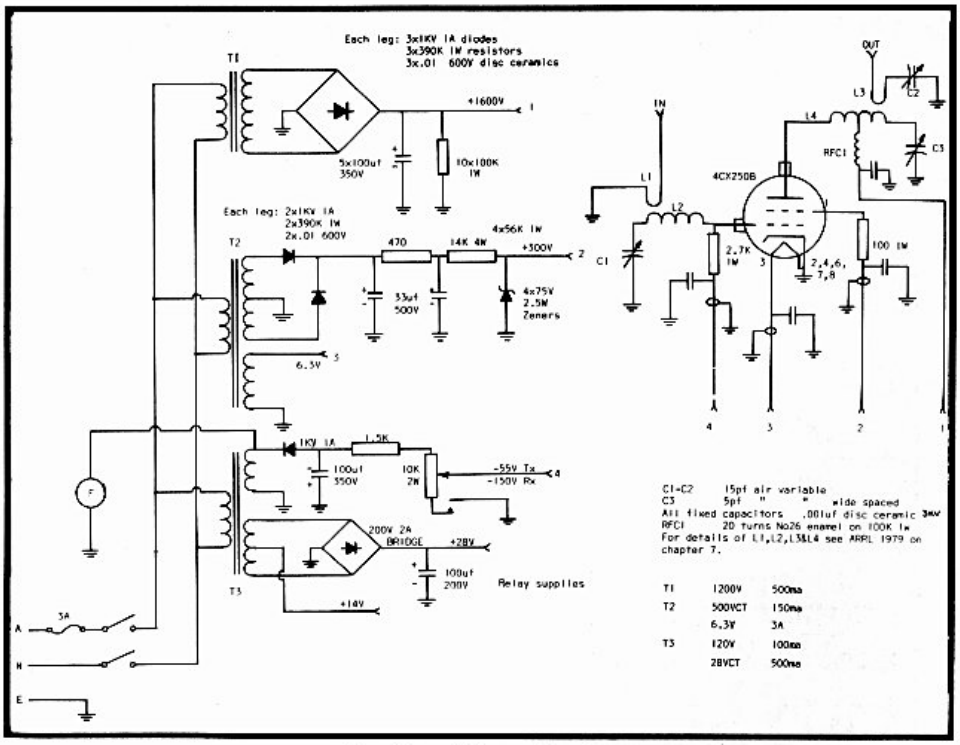
Another 2 Metre Amplifier

Rod Pym VK2DNP
21 Gilmore Avenue, Wagga Wagga 2650

Having been bitten by the 2 metre SSB bug, thoughts were directed towards constructing an amplifier capable of providing worthwhile gain over the trusty 6/40 amp. The 4CX250B tetrode seemed the obvious way to go, especially as I had managed to acquire one, along with an Eimac SK600 socket, both in mint condition. The resulting amplifier works very well and this article is presented as an example of one way to go for those contemplating something along similar lines.

There are many circuits about using the 4CX250B and its relatives on 2 metres and no originality is claimed for this one, the bulk of it being from the ARRL Handbook 1979 on, chapter 7, albeit modified to suit the contents of the junk box. This circuit was chosen for its seeming ease of construction of both the grid and tank circuits. These are about as simple as you can get and if, like me, you don't have access to someone who has already built an amplifier using this tube with a more exotic tank circuit, ease of debugging the finished product becomes important. In any event, the amp worked from initial switch-on and, with minor adjustment of the output coupling link, produces 200+ watts output when driven by an IC202. It is completely stable, very cool running, tunes very easily and exhibits no nasty traits whatsoever.

The early type SK600 socket used here required some work to make it suitable. It has the built-in low-inductance screen bypass capacitor but lacks niceties such as a screen shielding ring and the cathode, tabs 2, 5, 6 and 8, has to be comprehensively earthed. This was accomplished by passing a small brass bolt through the hole in each tab and a corresponding hole drilled in the socket skirt. The area around the holes drilled in the skirt, the tabs, and the underside of the head and nut of each brass bolt were tinned prior to assembly. After tightening each nut and bolt they were then sweated to the tabs and skirt. Tab 7, one side of the heater, was also treated this way. The screen shielding ring was made from a strip of flashing copper formed into a ring slightly smaller than the outside diameter of the socket and about 17 mm high. Soldered to it are three tabs that locate under the socket hold-down clamps. A chimney, essential for proper cooling, was not available so one had to be improvised. The top of a tomato juice bottle looked like the real thing so with the glass cutting skills of Alan VK2KAW, a suitable chimney was soon fashioned. A small (3 in. diameter blades) computer cooling fan drawing air from the underside of the socket through the chimney and the anode fins has proved quite adequate for the low duty cycle of SS Band CW. As the amplifier is not contemplated for use on FM this system of cooling has worked out very well with none of the noise associated with a blower.

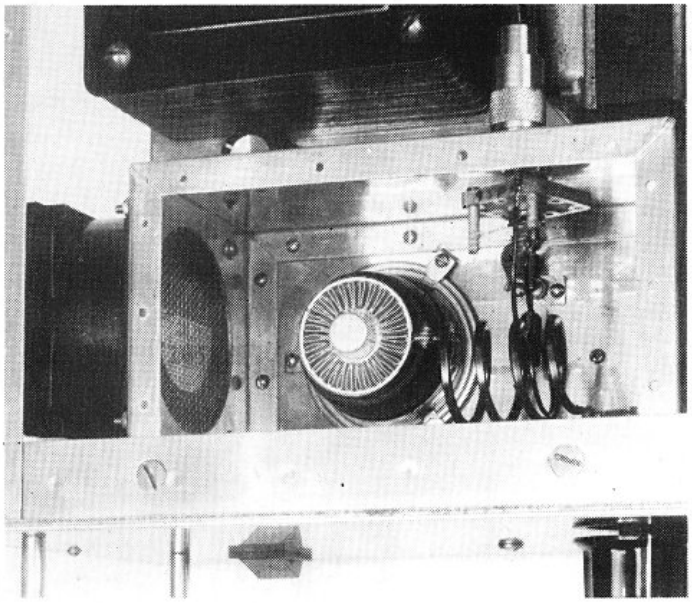


Circuit and Power Supply

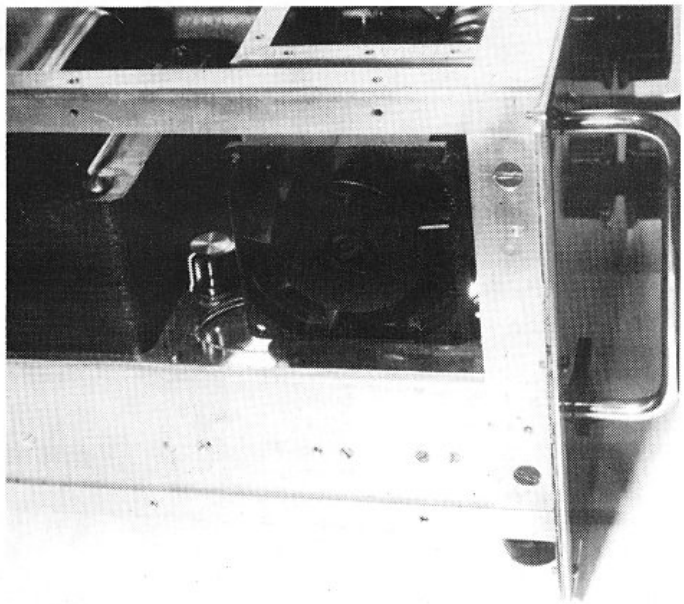
The power supply components were all assembled on printed circuit boards drawn up with a resist pen. No details of the layout are given as this will depend very much on what you have at hand and space available. Where possible, shielded wiring is used for connections throughout. The bias supply pot has one end earthed via a relay on transmit and should be set to give approximately —50V at the tube grid. On receive the full bias of —150V is applied to the tube, completely shutting it off. There is no detectable tube noise in the receive mode. The 4 x 75V zeners hold the screen at a constant 300V and the 14K series resistor ensures that the diodes are operating well within their ratings when no screen current is being drawn. The relay supply was devised to suit the relays on hand.

Each section of the power supply was checked for correct operation before final connections were made. With the output of the amplifier connected to a dummy load and a SWR meter in the input line, drive was applied and the input circuit adjusted for minimum VSWR by adjusting the series capacitor C1 and the spacing of the grid lines. Then the amplifier was switched on and carefully watched for any signs of stress. There being nothing untoward after about five minutes of warm-up, drive was applied for about five seconds at a time and the plate and loading controls adjusted for maximum power out. The screen current was monitored continuously so as not to exceed its ratings. This amplifier runs about 5 to 7 mA negative screen current and although this was a bit offputting at first, is apparently not uncommon with these tubes in linear service.

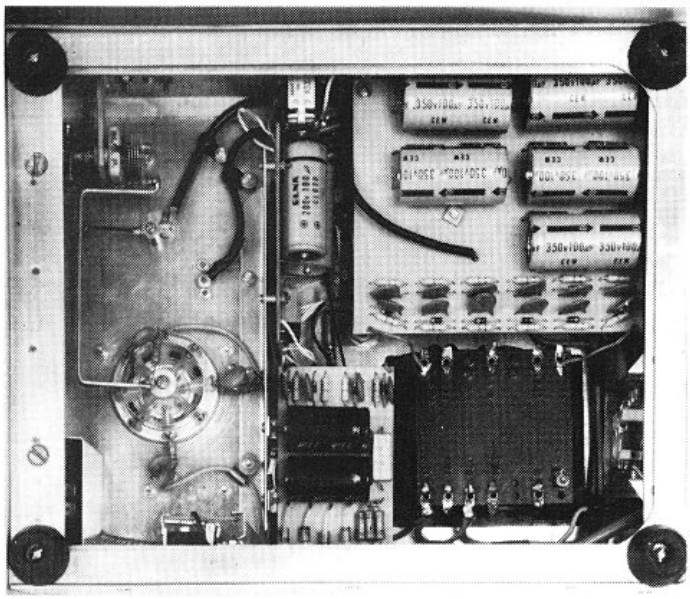
The output from the amp is fed via 17 metres of UR67 coax to 4 x 9 element yagis on 4.5 metre booms in a 4 metre square box configuration. Performance thus far would seem to indicate that the hoped for gain over the 6/40 amp has been quite handily achieved. Now if someone has a circuit for a good receive preamp. . . . ■



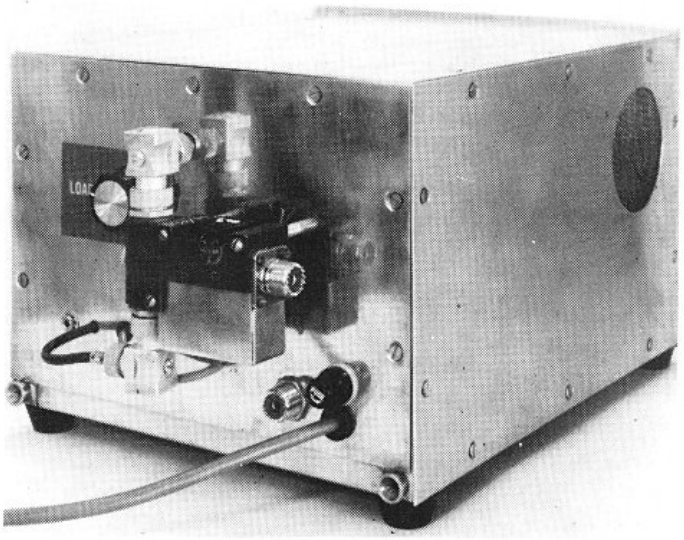
RF Compartment. Note: Screening on fan.



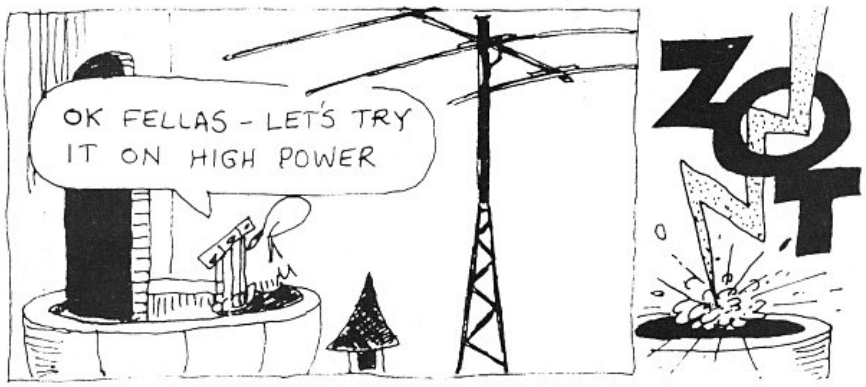
Cooling Fan Outlet. Note: Knob to left of fan for bias pot.



Underneath view of Chassis.



Rear view showing C/O relay and load control.



(Propagator, Nov. 1981)

A New Tower Design

J. Vogel L60052

Living in a suburban area presents some problems for amateurs and SWLs wishing to install an effective antenna system. This article describes the problems encountered with a tower and the final solution devised.

THE PROBLEM

After purchasing a 90 ft. commercial tower the problem of erecting it was tackled. It was realised that a 45 ft. tower would be possible and as the commercial tower was made from 15 ft. sections bolted together this seemed a good compromise.

To erect the tower two "spare" 15 ft. sections were bolted together and spaced 6 ft. behind the site of the tower. Two pulley blocks, 150 ft. of rope and a little assistance enabled the tower to be put into place.

A TH3Jr and a rotator were mounted on the tower. All was well until the time came to do further work on the aerial system. Although the tower would lie flat on the roof with the beam pointing north, the author had to call on his son and four other strong men plus a vehicle with a tow bar to lower the tower. And every time this was done a few tiles on the roof were damaged. Of course this damage was not discovered until it rained. Clearly something had to be done — my wife was getting fed up with using pots and pans to catch the water.

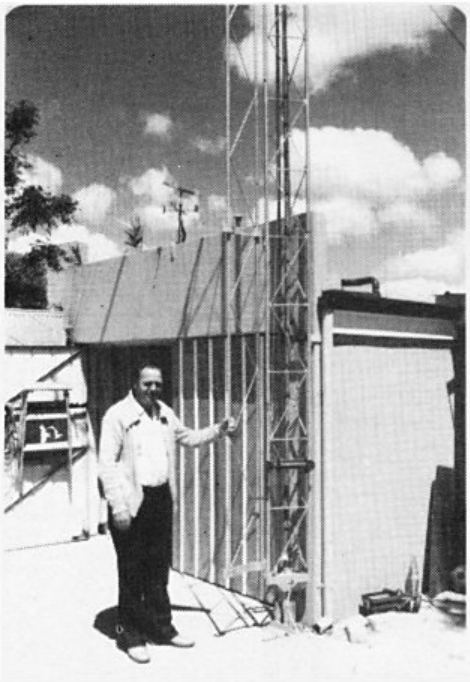
Another problem was that I had bought a 90 ft. tower and could only use half of it. The other half could not be sold as it was needed to raise and lower the tower.

So I had to consider a new telescopic tower or devise a modification to the tower that would allow additions and adjustments to the antenna system at or near ground level. The solution was to combine the best features of the commercial guyed tower and the telescopic types.

THE SOLUTION

A new base section of the tower was built. It was large enough for the 9 in. by 15 ft. sections to fit inside and one side was built like a door. The base was fitted with a ½ in. pipe to fit the original tower stand, which allows the tower to hinge on a ¾ in. x 6 in. bolt. The stand is bolted to the concrete driveway and brackets for the new base section were fixed to the garage wall.

With the new "door base" section secured it is a simple matter to raise or lower the tower. The top 15 ft. section is put inside the base and the door closed. The top section is then hauled up by means of a winch so that it projects out of the bottom section a short distance. A 12 in. x 15 in. platform is fitted near the top of the new bottom section to allow fitting of the rotator, antenna and top guys. Then the top section is winched up until the next section can be fitted beneath it. The door is opened and this next section bolted to the top. After the door is closed the second section can be raised and the bolts properly tightened before raising further. Additional sections are added in a similar manner and the process is reversed when lowering the tower.



John Vogel and tower. The door is open and the winch and steps are clearly visible. The platform and open door are clearly shown. Note the vertical on an extension arm.

CONSTRUCTION DETAILS

Figs. 1 and 2 show the general details of the new bottom section. Table 1 lists the parts required.

Put two full lengths (21 ft. 6 in.) of black ungalvanised) ¾ in. pipe on the floor and use a plank of 3/8 in. timber to space the pipes 10 in. apart. Using 12 gauge general purpose welding rods at 90A or 10 gauge general purpose rods at 100 to 120A tack weld a 2 in. x 5/16 in. x 10 in. long flat bar between the pipes at each end. Fit the 19 in. x 3/8 in. bracing rods, using tack welds, starting in the lieft-hand corner, in a zig-zag fashion up to the 16 ft. mark. Weld in another 2 in. x 5/16 in. x 10 in. flat bar. Continue to use tack welds. Add the bracing rods all the way to the top.

When this is done weld another 2 in. x 5/16 in. x 10 in. flat bar on top of the pipe at a 60 degree angle to the first. Add a second bar to the other pipe (see Fig. 3). Add two bars at the 16 ft. mark and at the bottom and lay the third ¾ in. pipe on top. Tack the pipe in position, gently turn over, replace the 3/8 in. board and weld the pipe in place, welding on the inside only. Add 3/8 in. bracing to one side as before.

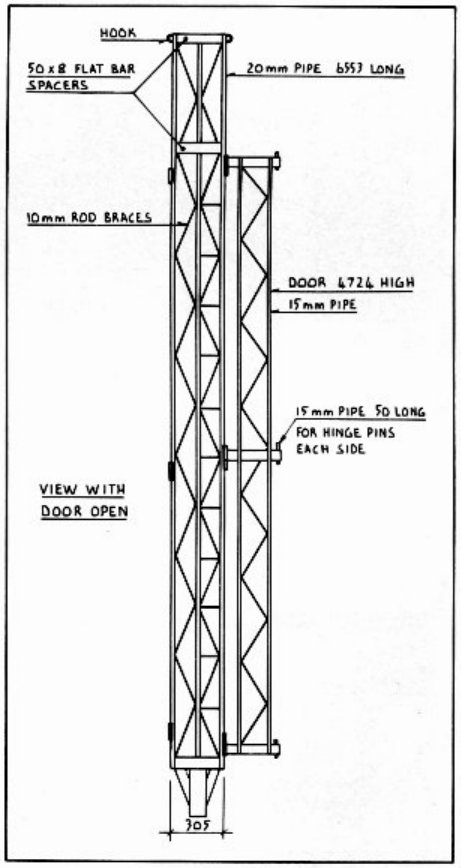


FIG. 1

Turn the tower over so that the open face is down and slide in the 3/8 in. timber plank. Slide in the tow 16 ft. long ½ in. pipes. Weld the tow ½ in. pipes to another 10 in. flat plate at the bottom, middle and the top. This forms the door, to which must be added hinges, etc. (see Fig. 4). Weld in the 3/8 in. braces as before. The hinges for the door are made from 2 in. lengths of ½ in. water pipe; a ½ in. or 5/8 in. bolt passes through two of these short lengths of pipe, one of which is welded to a ¾ in. pipe on the base and one to the door via a small bracket. Weld two hinges at the top, centre and bottom of the door. By removing three bolts from one side the door can be made to open and swing out. Keep the 6 in. hinge pipe clear of the door frame so that it opens freely.

Now fix a plate to take the winch. Fit two 2 in. x 5/18 in. x 6 in. long bars at the top to take a pulley sheave as in Fig. 5. Weld extra 10 in. x 3/8 in. bars on to the door to act as steps (see Fig. 6).

Weld in three 5/8 in. x 2 in. x 5/16 in. flat bars and the 12 in. length of 1½ in. pipe as in Fig. 7. To allow the base section to hinge over (a handy feature for tuning aerials as well as assisting erection) a ¾ in. hole is drilled 2 in. from the bottom of the 1½ in. pipe. Keep in mind the direction the tower is to hinge over. The stand which I had purchased with the tower is

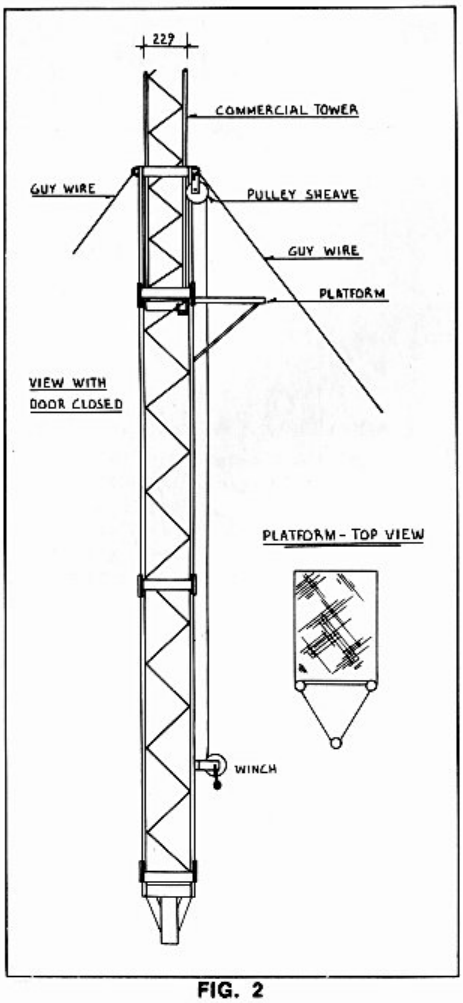


FIG. 2

shown in Fig. 8; it is made from 4 in. x 1¼ in. channel.

Carefully lift the tower on to trestles and weld it securely. As long as the door is bolted in place no problems will be experienced with buckling. Clean all the welds.

At this stage the 12 in. x 18 in. x 1 in. braced platform can be added.

The new base section is now complete and should be given several protective coatings of paint before erection.

Alternatively galvanised material could be used or the assembly could be commercially galvanised. Galvanised material can be welded with zinc enriched rods.

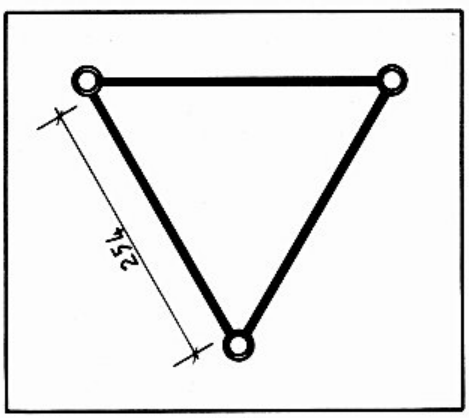


FIG. 3

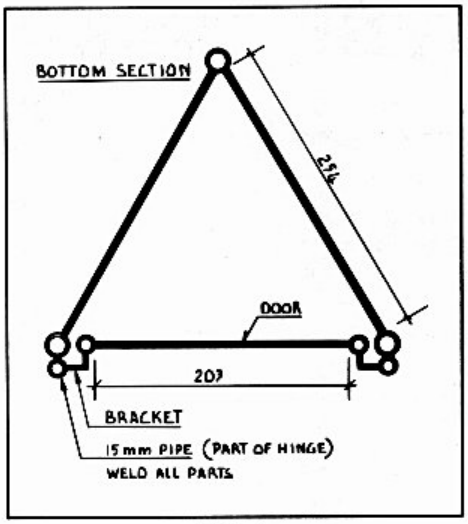


FIG. 4

If a mixture of galvanised pipe and 3/8 in. black rod is used hold the welding rod two-thirds on the galvanised pipe and one-third on the 3/8 in. rod. A note of caution: The fumes generated by welding galvanised material are poisonous. Do your welding in a well ventilated area (wear a suitable mask as well.—Tech. Ed.) and drink plenty of milk (not beer).

Don't forget to wear the proper protective gloves and screen. (Apart from burns caused by hot metal or hot sparks a form of sunburn is caused by exposure to UV light from electric arc welders. So don't wear shorts and a singlet — cover up.—Tech. Ed.)

If you are unfortunate enough to get "welding flash" (caused by exposing the eyes to the naked arc) and if the shops are shut, the author suggests the following "cure". Obtain two used tea bags. Make sure they are wet and place one over each eye. Squeeze some of the cold tea out of the bags and let it under the eyelids by opening the eyes slightly and then closing them. This will provide some relief.

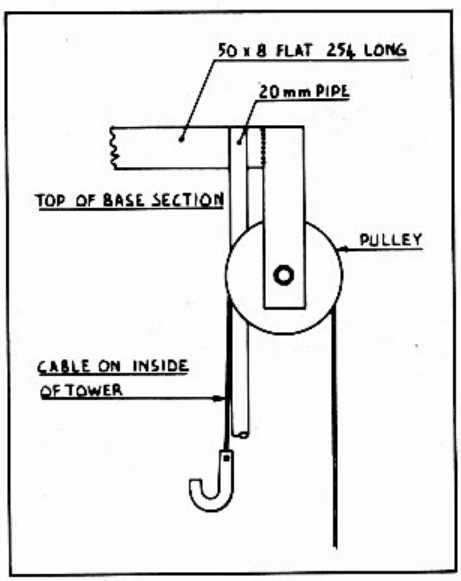


FIG. 5

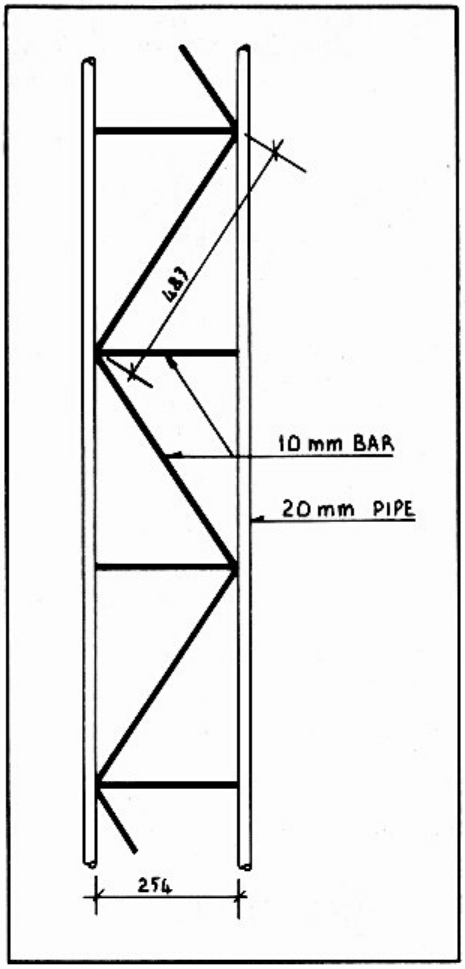


FIG. 6

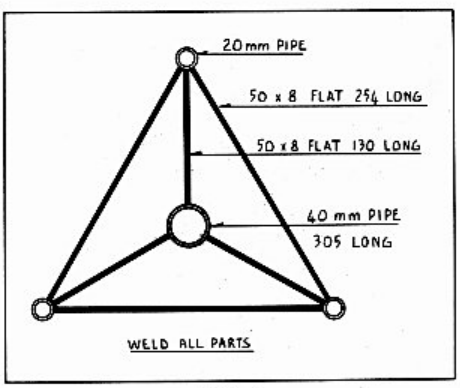


FIG. 7

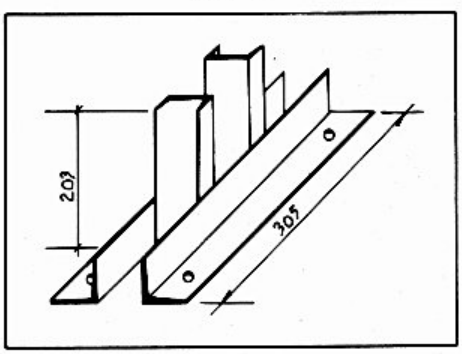


FIG. 8

REFINEMENTS

To attach the guy wires I fitted hooks made from ½ in. chain. This allows the guys to be quickly attached or removed while standing on the platform.

To make the hooks I cut 1 in. out of one straight side of the links and drilled 1/8 in. holes in each end as in Fig. 9. The link was fitted over the tube at the tip of the tower where the guy wire would normally go. A strand of guy wire was used to loop through the 1/8 in. hole and around the link to secure it in position.

I had a little problem with the tower section joining bolts catching on the top of the "door" base. On the newer commercial towers a small plate has been added to each corner to take the bolts and plastic locating pins fitted. So I did the same, as shown in Fig. 10.

Several weeks after erection the guy wires became slack. Instead of tightening them one at a time, I placed a small screw-up type car jack under the bottom tower section inside the door section. By operating the jack all wires were tightened at once. This led to another modification. The bottom section was removed and replaced with a 1½ in. pipe with a heavy thread on the bottom end to act as a jack.

REGULATIONS

It may be necessary to have your installation approved by the local council. In my original set-up the system is stronger than the original commercial tower. My system was inspected by the Shire Inspector and Shire Engineer. Their comments were most complementary.

The photographs taken by VK6LY show the finished tower. If readers have any queries the author will be pleased to discuss these, but please send a SAE.

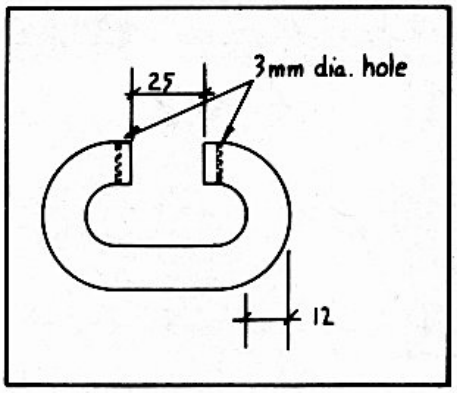
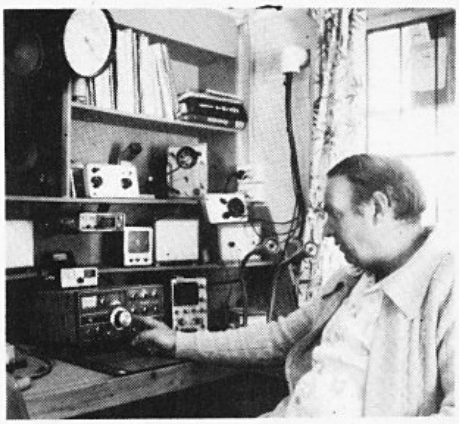


FIG. 9



John Vogel, back in the shack, makes sure that the system works.

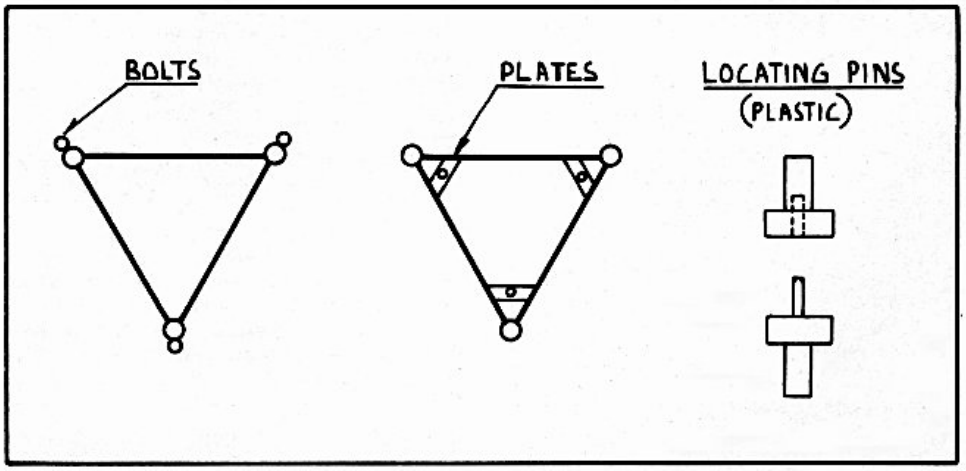
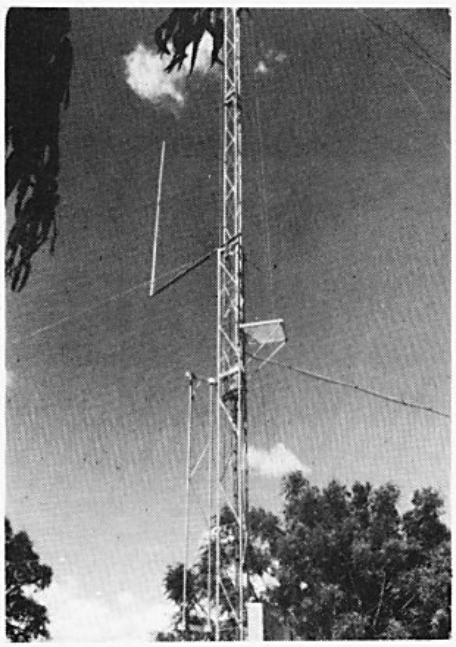


FIG. 10

TABLE 1: Parts List.

Material	*Size*	*No. reqd.*	*Used for*
⅜" rod	19"	28	Side bracing
⅜" rod	18"	14	Door bracing
½" pipe	2"	12	Hinges
½" bolts with nuts and washers	5"	6	Hinges
⅜" rod	10"	13	Steps
½" bolt	2"	1	Sheave
5/16" x 2" flat	10"	9	Spacing
¾" pipe	22'	3	Base section
½" pipe	16'	2	Door
5/16" x 2" flat	8"	3	Door
1½" pipe	12"	1	Base
5/16" x 2" flat	5⅛"	3	Base
5/16" x 2" flat	6"	2	Pulley sleeve
Plate for winch			
3/16" wire cable	50'		
⅜" pipe	2"	1	Sleeve
5/16" x 1" flat	8"	1	Flat for hook
L shape bracket		6	Hinges

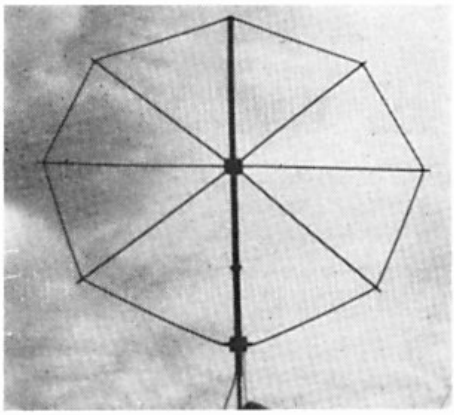
Note: Pipe is ungalvanised (black) water pipe. ■



The top end. The TH3 is up where it works best!

A 10 ft. Diameter Receiving Loop on 1.8 MHz

C. H. Castle VK5KL
29 Turnbull Road, Enfield 5085



Like most operators on 160 metres, I also only have a small suburban block of land and no room to run out enough length for a Beverage antenna for receiving. For years I have been doing with a half-wave length around the fence and putting up with high noise level most of the time. Many hundreds of contacts throughout the world have been enjoyed, but I am always striving to improve reception. On recommendation from K0PP I dediced to try a loop.

After acquiring a 30 foot length of RG8A/U coax, means had to be found to hold it out in the required shape.

A block of wood 6 x 5 x 1½ in. was cut as shown in Fig. 1, and six holes, to take the dowels, drilled with the aid of a dowel jig. The block was bolted to the centre upright 5 ft. 6 in. from the top.

The Eddystone 6 x 4 x 2 in. metal box was drilled at each end and the bottom was fitted to take coax sockets and was then bolted to the centre upright 5 ft. from the centre. In the prototype ½ in. dowel was used but ⅝ or ¾ in. is suggested for more permanent construction. The dowels were inserted into the centre block, it was not found necessary to glue them. (Glueing and when dry, painting with external plastic paint is recommended.—Ed.) Coax plugs were fitted to each end of the 30ft. length of coax and at the centre of it the plastic outer covering was cut away for about 1½ in., then the outer braid was cut and trimmed back for ¼ in. The removed covering was replaced and taped, then a further covering of Denso 510 waterproof tape (as used in the building of caravans) was wrapped around to cover the cut section and so weatherproof it.

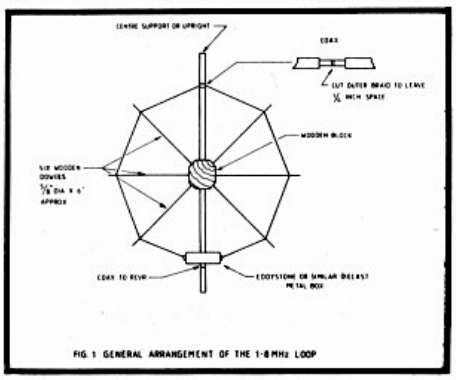


FIG. 1 GENERAL ARRANGEMENT OF THE 1·8 MHz LOOP

The centre of the coax was screwed down to the upright using plastic saddles. The plugs on each end of the coax were screwed into the sockets on the metal box. The coax was then saddled down to the six dowels at equal distances from the centre piece so it became tight. The dowels were cut off about 2 in. past the coax. The framework with the coax is quite stable.

Inside the metal box I mounted a piece of PCB with the emitter follower circuitry, Fig. 2, on it and also the fixed capacitor to resonate the loop. See Fig. 3. The loop has to be resonated at 1810 MHz or wherever you choose.

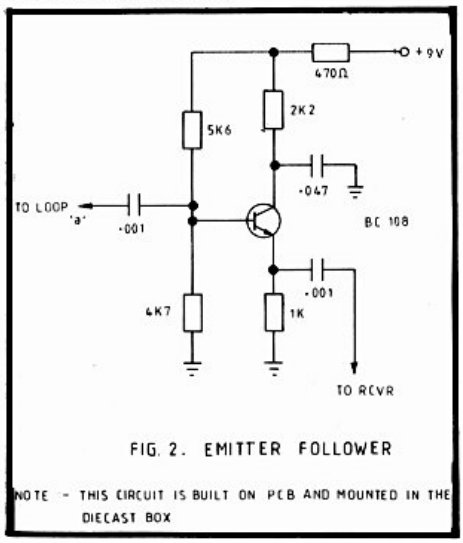


FIG. 2. EMITTER FOLLOWER

NOTE - THIS CIRCUIT IS BUILT ON PCB AND MOUNTED IN THE DIECAST BOX

I used a variable condenser and, by listening to the receiver, resonated the loop by tuning for maximum noise. To obtain the same value of capacity I connected the condenser to an inductance, and grid dipped it and measured the dip frequency using a frequency counter. Then I substituted a fixed condenser for the variable one, selecting values until it resonated at the same frequency. The completed loop is shown in photo.

The loop performs well, cuts noise to half that of the half wave receiving aerial and has bi-directional properties. There is a big null between end on and broadside on. Tested on a signal about 10 miles away, it was able to null it from S9 to inaudibility.

You won't get quite the same effect on DX signals, possibly because of the signal having more skywave, but it does null down signals on the side and you can peak signals end on. The next project is to install a rotator so it can be operated from the shack position and not by manual means. Note it is only necessary to rotate through 180 degrees. The reason for rotating it is because it has been noticed in the short time of using it that on some nights DX signals from the USA will vary in their bearing according to the prevailing propagation path. It is not necessary to install it very high, fence height is adequate; in fact before completion with the coax lying on the shack floor I was able to copy two American SSB stations on 1815 MHz.

So if you have a noise problem, are frustrated at not being able to run out a beverage, and keen to improve your reception on top band, may I suggest you try a loop, you will be more than surprised at the result.

Postscript: For the metricated 1 in. equals 25.4 mm, 1 ft. equals 304.8 mm. ■

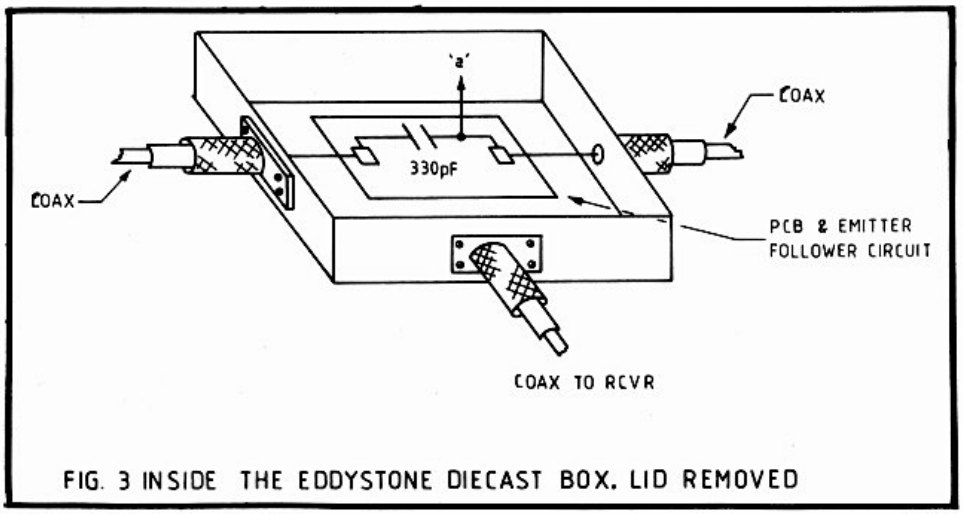


FIG. 3 INSIDE THE EDDYSTONE DIECAST BOX. LID REMOVED

Antenna Tuner Adjustment — Aurally and without Radiating a Carrier

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7 The Glen, Beecroft 2119

The following article may interest:—

- **Amateurs with visual handicaps who need to use an ATU.**
- **Maritime Mobile Yachties who use backstay as radiator (with ATU).**
- **Short Wave Listeners using a random length antenna.**
- **Anyone who uses an ATU who wishes to fully adjust it without dropping a carrier on air.**
- **People who worry about their finals during ATU adjustment.**

Tom VK2DTB and I worked together on this little project, so the use of the word "we" is *not* an instance of the "Royal Plural" so often heard on the bands.

One particular amateur friend of ours is totally blind and he had mentioned that "the thing he needed most was an ATU which he could tune aurally". It seems there are sliding tone SWR meters used by some blind operators, but they are sometimes not too easy to use with accuracy.

Another friend, Brian VK2KTQ, wondered aloud one day "If a noise bridge could be embodied in an ATU so that people could tune up in receive mode, thus eliminating the need for all those unending carriers we hear". When his message sank in as a possible aid to blind operators, Tom and I decided to give it a try.

As an experiment we used a Palomar RX noise bridge, with "R" setting pre-adjusted to read 50 ohms and neutral "X", between transceiver and ATU, adjusting the *ATU* to achieve a deep null on receiver noise at the chosen frequency. The noise bridge was then removed from the transmission line and a joiner inserted to apply a signal to test for SWR. We invariably achieved readings of 1.2 : 1 or less, on a non-resonant dipole, which *untuned*, had up to 7 : 1 SWR on some frequencies tested.

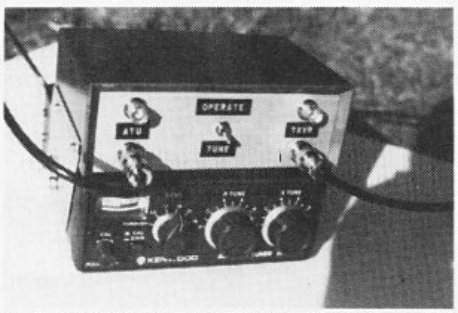
The idea, it seemed, was workable. We now wanted a good noise bridge circuit which we could modify with a fixed 50 ohm resistor in the known leg of the bridge, in lieu of the variable resistor. Xc and X1 were ignored because our objective was to balance these in the antenna *system* by adjustment of the ATU, thus presenting the transmitter with a 50 ohm resistive load. This allowed FT7s and TS120 series, etc., to develop full output.

I wrote to Bob VK3SK, and sought his advice on a suitable noise bridge and mentioned our other consideration about isolating the bridge from RF when in transmit mode. (Readers will recall Bob's three very complete noise bridge articles in AR recently.) His advice was quickly to hand and much appreciated.

A prototype bridge, using the circuit presented in Bob's third article (AR May 1981), was built on to veroboard. We replaced the variable resistor with two 100 ohm ¼W 1 per cent resistors in parallel and deleted the fixed and variable capacitors in the bridge. It worked well.

Then Tom discovered a new bridge circuit in the 1981 ARRL Handbook, which uses a 555 timer to produce a 100 Hz square wave. This note modulates the zener-produced RF noise and is said to "enhance" the null-finding ability of the bridge. Moreover, a PSB layout is presented, so we tried it. The one kHz note is resolved on AM mode and is very useful, but on CW and SSB mode, the "white noise" is merely "slightly coloured". It is, however, a worthwhile difference, so we have standardised on this modified board.

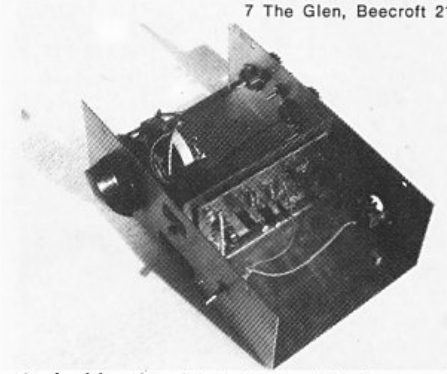
The device has to have a switched "through" position so that on transmit, the noise bridge is isolated and shielded from RF. A simple system of two BNC plugs which plug into two pairs of BNC sockets was chosen as a quick, positive method of isolation switching for the first two production models. (See photo 1.) The lower pair of sockets connect the bridge into the transmission line for tuning on receiving, the upper two sockets are bridged with a short length of RG58U, thus bypassing the noise bridge for transmitting.



1. A completed installation. Mark 1 and 2 models were stripped at AT120/AT130 tuners.

The noise bridge requires a 9 volt battery or alternatively a 9 volt plugback can be used. On models 1 and 2 a central on/off switch is used with shielded wiring and is bypassed to the case on the "hard-wired" side to guard against RF being induced into the positive rail of the bridge when in transmit mode. Both plugs and the switch are *down* for TUNE and in *up* position for OPERATE.

The third unit has been fitted with a ceramic switch to handle the transmission line switching but the separate 9 volt DC power switch was retained — the newer layout deleting the need to use shielded wire or a bypass capacitor. (See photo 2.) So far, No. 3 seems to perform as well as No. 1 and 2 but we are anxious to see if the ceramic wafer switch proves reliable and able to handle 100W adequately. (These contacts are usually rated to 2A DC, so for power up to 50W they should be satisfactory. Two in parallel should be quite adequate for 200 watts. At the 100 watt level a single contact may be satisfactory for ICAS.—Ed.)



2. Inside the Mark 3 model. A ceramic switch replaces BNC plugs and sockets arrangement. Two So 239s and the 9V input socket can be seen. PCB is mounted on screening baffle.

By now the reader will have noted that both types of device are exposed to Murphy's Law in regard to accidental transmission while the bridge is in circuit. Even a cough while VOX is selected will, of course, damage the bridge. We just rely on our users remembering the tuning drill. However, it would be fine if we could find a simple, inexpensive way to inhibit transmit function with the device in TUNE mode. The rigs in common use with blind operators are the FT7 series, the TS120/130 series and the like. (Any suggestions please, re disabling transmit function, with RXR operative for tuning the ATU — using the above type transceivers?) (See Fig. 1.—Ed.)

Incidentally, both these type rigs have no switch to select AVC or AGC "off", as we have in most larger rigs. Hence with full RF gain, the initial slight null is hard to find before the AGC fills it in. The AGC is so swift and efficient that it completely hides the first (partial) null. Rather than modify sets to allow AGC to be switched "off", we have asked our users to reduce RF gain to the point where AGC becomes sufficiently ineffective to allow the initial null to be recognised. From here R and X are alternatively tuned to produce a very deep and usually very sharp null. This sharp, deep null invariably gives SWR readings of 1.2 : 1 or less. The trick is in finding best RF gain setting to catch that first null. If you have ability to switch AGC off, it is a piece of cake and very quick.

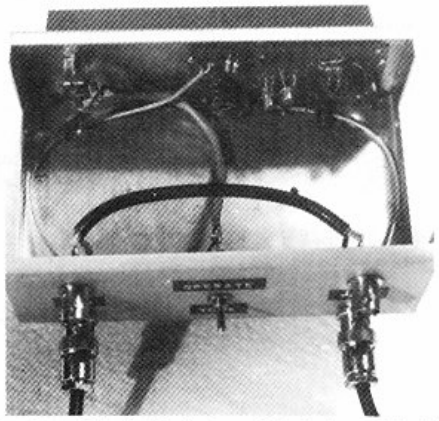
Anticipating the reader's next question — we found there was only *one* null position obtainable. This produces a low SWR reading with high power output, but perhaps I should be more explicit. When we used an AT120 tuner and kept R and X tune knob indices between the graduations zero to ten, we have been unable to find

any ambiguity of null positions. Whether this would apply to *all* ATUs or transmatches, at this stage, we have no idea. (Reader findings invited please.)

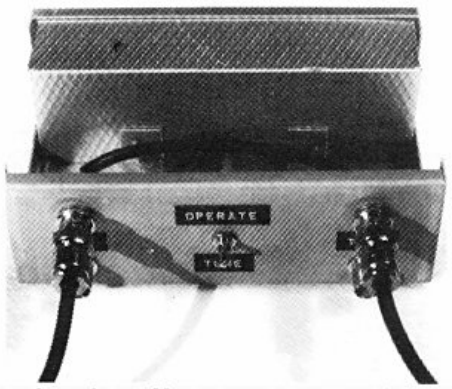
MORE ON CONSTRUCTION

The AT120/AT130 was used not only because we had one to work with but, more importantly, it is uncomplicated for use by blind operators, it is rugged and compact, it handles FT7B and TS130S type powers and is reasonably priced. Also the little built-in SWR meter is useful for someone looking over a blind operator's shoulder during the initial period. The blind operator needs to develop confidence in a good deep null resulting in a near 1 : 1 SWR. (We have two XYLs and one harmonic "trained" to confirm SWR readout for the OM.) There may be other brands of antenna tuner which are equally suitable — we just haven't got round to trying them. The AT120 type, to us, fills the bill perfectly.

The box chosen for the device closely matches the width of the AT120 and can be strapped atop the ATU, using the mobile mount screws and two aluminium plates, thus giving some body to the device to facilitate plug position changing. (See photo 1.) Internal shielding can be seen (compare photo 3 and 4).



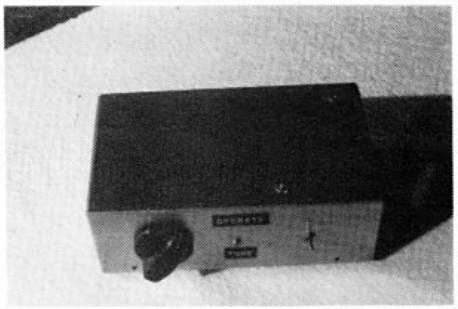
3. Completed Mark 1 and 2 before shielding is fitted.



4. Completed Mark 1 and 2 with shielding in place, awaiting cover.

Mark 3 unit uses two type SO239 connectors on the rear panel, the switching as mentioned above, is performed by a ceramic wafer switch. The switch for 9 volt supply and wiring lie within the bridge circuit shielded section, so shielded wire and bypassing were not used. Both types of unit have a suitable polarised socket for 9 volt DC battery or plugback on the rear face. (See photo 2.) Miniature 50 ohm Teflon coax was used internally into and out of the noise bridge board for ease of connection and assembly.

Photo 5 shows completed Mark 3 unit.



5. Finished Mark 3. Switching still points Up for operate and Down for tune.

The PCB for the ARRL bridge is double sided, the component side being used as a form of ground pad. We made provision for mounting the two 100 ohm fixed resistors on the board, so that the board we use can also be used for the standard ARRL 1981 version of RX bridge. (See "notes" for local availabitliy of PCB, toroid, etc.)

PERFORMANCE NOTED TO DATE

SWRs achieved by use of noise bridge are generally 1.1 : 1 or less, on all bands except 10 metres. On this band we suspect X1 or Xc develops within the bridge circuit to the degree that 1.2 : 1 or less is the figure we found. However, this is still a practical figure for our purposes and compensation within the bridge circuit would doubtless affect all other band figures.

The three units are at present being used by three visually handicapped amateurs, two of whom are totally blind. Tom and I are looking forward to their feedback in case we need to make some modifications.

All three have quickly achieved the knack of reducing RF gain to detect that first null so it appears that we do not need to fit an "AGC off" switch to their rigs. So far, the rigs and ATUs are unmodified except for the provision of some kind of protusion to indicate the lubber line on tuning knobs.

To time of writing all three testers have expressed general approval of the devices. Our longest user writes: "We have a real goer with this unit" and other gratifying comments. In all, it looks as if the project has some usefulness.

SHORT WAVE LISTENERS

SWLs could try the bridge idea with an ATU to peak up their random length antenna. I have seen ATUs advertised specifically for the purpose of SW listening. In this case the noise bridge could be left in circuit and merely switched off with no fear of damage to the bridge.

MARITIME MOBILES

Maritime mobiles often use an ATU in conjunction with the permanent backstay of their craft. The device outlined above could permit them to tune up their backstay while conserving battery power in receive mode. It may even be advantageous for copying weather broadcasts on a general coverage receiver on frequencies outside the amateur bands.

GENERALLY

One US manufacturer is already advertising such a product. I hope they sell a bundle!

FINALLY

I plan to make a fixed noise bridge for my own use, because I find it fascinating to tune-up my (deliberately) non-resonant dipole *right on top* of a certain net without them hearing one "dit" from me, until I check in. I do not like committing carriers needlessly.

ACKNOWLEDGEMENTS

Our sincere thanks to the many amateurs who have assisted us with advice and know-how.

We wish to acknowledge, with thanks, the donation of an AT120 antenna tuner by Trio Kenwood Australia, specifically to enable continued testing and development of the device for those visually handicapped — a fine contribution.

We also acknowledge kind permission from Laird Campbell W1CUT, of the ARRL, to utilise material printed in the 1981 ARRL Handbook in this article.

NOTES

1. For full details and instructions of noise bridge circuitry used, see the 1981 issue of ARRL Handbook, page 16-31, and on.
2. PCB for the above, modified as in text, drilled and plated, is available from Ian Pearce, PO Box 92, Round Corner 2158, NSW. Price $5.00.
3. Ferrite toroid specified, Amidon FT37-43, is available from R.J. and U.S. Imports, PO Box 157, Mortdale 2253, NSW ($1.10 plus 80c p. and p.).
4. For those wishing to buy a built-up adjustable RX noise bridge, I understand we now have one designed and built locally. For details write to Kit Bits (Aust.), 110 Rosemead Road, Hornsby 1077, NSW. ■

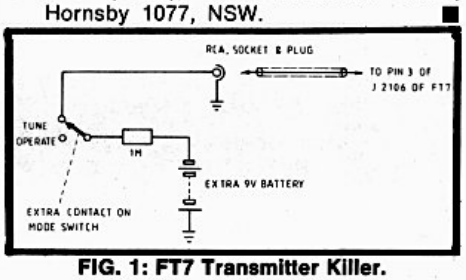


FIG. 1: FT7 Transmitter Killer.

This is a suggested circuit from VK3AFW for "killing" the output from an FT7 if it is accidentally keyed during tune-up of the ATU when using the system described in the text. The transmitter output will be less than 1 watt; a few seconds at this level should do no harm. A similar circuit may be effective with other transceivers.

Chitary's Melbourne

Earl Russell VK3BER

On the 3rd of November, 1981, Chitary Moriyama (JH6THP/VK2DWX) departed from Japan on his dream trip to Australia. (For details about Chitary and the purpose of his visit see AR October 1981, pages 18-19.) After spending some enjoyable days in Sydney and Canberra, Chitary and his brother, Mashio, arrived at Melbourne Airport at 6 p.m. on Tuesday, 17th November. Disembarking from the plane had to be achieved with the aid of a forklift — an unnerving experience — before Chitary was able to meet the group of amateurs and friends who were at the airport to welcome him. After the airport welcome we made the 1½ hour journey to Frankston, where the owner of the Beach Flag Hotel had offered free accommodation to Chitary and Mashio.

The first official function the following day was an afternoon visit to the Japanese Consulate to meet His Excellency Mr. K. Kaneko, the Consul General of Japan. The Consul General congratulated Chitary on his courage and determination not to allow his disability to confine him to a hospital. Chitary explained the benefits of amateur radio in creating and maintaining international goodwill and friendships, as well as the therapeutic value to a person suffering from various handicaps and disabilities. While Chitary was visiting the Consul General a news team from the Nagasaki Broadcasting Company arrived in Melbourne to make a 55 minute documentary of his visit. The news team caused much amusement with their activities. The producer, Mr. Kunikatsu Mori, and the camera man, Mr. Ichiro Ishiguka, were on their first major assignment out of Japan. Their equipment would have made the ATV boys' mouths water — Sony ENG camera, 2 VCRs using cassettes the same size and timing as a C60 audio cassette, and a monitor for viewing tapes — all powered by Nicad battery packs. I hope to be able to obtain a copy of the documentary they made. At the last count they had "exposed" more than 10 hours of tape. They were very professional, with a minimum of intrusion consistent with their filming commitments and great ambassadors for their country.

Wednesday evening Chitary was guest of honour at a reception organised by the Victorian Disabled Citizens' Association (VDCA), with the support of Doncaster Rotary, Apex and Jaycee Service Clubs. The meeting was chaired by Mr. George Taylor, President of the VDCA. Earl Russell VK3BER introduced Chitary, who spoke about facilities for the disabled in Japan, as well as the benefits of amateur radio, particularly as an interest for disabled persons. After his speech, Chitary presented an IC730 HF transceiver and power supply and an IC2A hand-held 2 metre FM transceiver donated by ROAR (ROtary Amateur Radio) of Japan to Mr. David East, President of Doncaster Rotary Club. Mr. East then presented the equipment to the president of the VDCA for use by disabled amateurs. It was interesting to learn that the Doncaster Rotary Club was the founder of the Victorian Muscular Distrophy Association. Among the other guest speakers during the evening were the Japanese Consul General, the Mayor of Doncaster and Bill Yates VK3SB. Bill presented Chitary with the Moorabbin Radio Club Award and made his presentation speech in both Japanese and English. Among the many guests present were some 20 amateurs, including three who had met Chitary in Japan. They were Bill VK3SB, Des VK3CO and Alan VK3AL. It was a great pleasure for Chitary to "eyeball" these friends in their own country.

The following day (Thursday) was a busy one for Chitary. The first activity was a visit to the WIA Victorian Division Centre. This was followed by lunch with the THUGS (Thursday Group). There were approximately 25 amateurs there, and the ever present TV crew got some good footage of amateurs relaxing. Chitary was made an honorary THUG and presented with his certificate of membership.

In the early afternoon a visit was made to the Yooralla Special School at Doncaster, where Chitary was welcomed by the Principal, Mr. Tony McNamara, and the President of the Muscular Distrophy Association, Mrs. L. Price. Chitary spoke to the older pupils about life in Japan and how amateur radio broadened his horizons. A boy suffering from the same disease as Chitary was particularly interested in learning more about amateur radio, and the Principal would be prepared to establish a station for them. If anybody in the area has time to spare to instruct these boys so they can obtain licences it would be greatly appreciated.

The final item on the day's agenda was a visit to the Radio Australia Studios in Melbourne, where Chitary recorded a 20 minute interview for subsequent replay on Radio Australia.

On Friday morning the Mayor of Frankston, Cr. Rogan Ward, held a morning tea reception for Chitary. The Mayor wore his full regalia, which greatly interested the Japanese, as their civic leaders have no special robes of office. The Mayor explained each item of his regalia and the functions of local government. At the end of the reception the Mayor presented Chitary with a set of cuff links bearing the Frankston Coat-of-Arms. Chitary's visit to the Frankston Civic Centre highlighted the lack of suitable wheelchair access, and plans are now under way to rectify this situation.

Friday evening was the amateur radio highlight of Chitary's visit. He was guest of the Eastern and Mountain District Radio Club. The Club organised a combined meeting with the Moorabbin and District Radio Club via amateur television through the Melbourne ATV repeater. The combined attendance at the two venues was around 250, and many more watched proceedings via the repeater. WIA Federal and Victorian Division executives, and Department of Communications were represented at the EMDRC. I won't attempt to mention any names and call signs of those present, as it would be a dis-service to any I unwittingly omitted — suffice to say that it would read like a who's who in Victorian amateur radio. I will mention three people who did an outstanding job — Peter Cossins VK3BFG and Niel Muscatt VK3BCU, who organised the ATV at EMDRC and MDRC, and John O'Rorke VK3XS, Vice-President of EMDRC, who chaired the meeting.

The telecast commenced with the Mayors of Nunawading and Moorabbin exchanging greetings and friendly insults over ATV. Chitary was introduced by an old friend, Des VK3CO, and addressed the combined meeting. The Mayor of Nunawading presented Chitary with a beautiful plaque on behalf of the EMDRC for his services to amateur radio and international friendship.

On Saturday afternoon a helicopter flight was organised in the Peninsula rescue helicopter. During the drive from Frankston to Mt. Martha, where the helicopter is based, there was an excited babble of Japanese from the back seat and a request to stop the car. We were passing a paddock full of sheep, and to the average Japanese, Australia is sheep (and kangaroos and koalas). There was no way the TV crew was going to miss this footage! Eventually we got them reluctantly back in the car (after pointing out the danger of snakes in the long grass in which they were standing). Chitary really enjoyed the helicopter flight over the southern end of Port Philip Bay. He had been looking forward to it with great anticipation and some trepidation ever since I first mentioned the possibility to him some months earlier. The weather was fine and clear with no turbulence. The flight had to be shortened by a couple of minutes as there was a rescue call for the helicopter, and whereas it took about ten minutes to get Chitary settled comfortably in the helicopter, it only took 30 seconds to get him out again.

Saturday evening there was an "open house" barbecue and evening at my QTH, where a good number of people dropped in for a friendly chat with Chitary, quite a few who had spoken to him on air. The ubiquitous TV crew were "on duty" during the evening, filming everybody and every-

thing. Altogether they filmed three meals at my QTH. Each occasions the Melbourne weather was fine and warm and we had our meal outside on the balcony. I am sure Japanese TV viewers will get the impression that Australians always dine out-of-doors.

Regular skeds were maintained back to Nagasaki to keep the medical staff at the hospital informed of Chitary's progress. Coincidentally the station taking the sked on Saturday night was an engineer from Nagasaki Broadcasting Company. The TV crew had been having trouble with their VCRs (they were trying out a lightweight domestic model) and were able to discuss the problem direct with their boss. They were amazed at the clarity of reception. The QSO was filmed and I hope it makes it into the final documentary.

Sunday was a rest day, as Chitary was starting to feel the strain of his rather busy schedule. A "Japanese" evening was organised for him, Yasuo VK3KYT with two other Japanese amateurs living in Melbourne, Hiro and Yoshi, and their families attended.

The remainder of Chitary's visit was a leisurely sightseeing few days and an overnight visit with Alan VK3AL.

The farewell at the airport on Friday evening was a sad occasion for the amateurs and their families, and members of the VDCA who were there. It was difficult to say farewell to these people who had become such good friends in the short time they were here — the TV crew, two very hard-working, interesting and amusing people when they relaxed — Mashio, Chitary's young brother, who stayed in the background watching over Chitary, instantly alert to his every need — and finally Chitary, that tough little guy with a cheeeky grin who quickly gained a very special place in our hearts.

Chitary has now coined new phonetics for his call sign — JH6 Tremendously Happy Person. ■

Welcome Chitary to the ATV broadcast at the EMDRC. Chitary Moriyama JH6THP/VK2DWX, Peter Wolfenden VK3KAU, WIA Federal President, and Dr. David Wardlaw VK3ADW. Photo by John VK3KCA.

WIRELESS INSTITUTE OF AUSTRALIA

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Gen. Mtg. — 2nd Wed., 20.00.

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Broadcasts— 1.825, 3.580, 7.120, 14.342, 21.175, 28.400, Rpt. Ch. 6700 and 7000 Sundays from 0900Z (Sat. 2300 UTC).
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Secretary — Mr. W. M. Wardrop VK5AWM
Broadcasts— 1820, 3550, 7095, 14175 kHz; 21.195 28.470 and 53.1 MHz, 2m (Ch. 8): 09.00 S.A.T.
Gen. Mtg. — 4th Tuesday, 19.30.

WA:
President — Mr. B. Hedland Thomas VK6OO
Secretary — Mr. F. Parsonage VK6PF
Broadcasts— 3560, 7075, 14100, 14175 kHz. 28.47, 53.1 MHz. 2 metres Ch. 2 Perth, Ch. 6 Wagin. Time 0130Z.
Gen. Mtg. — 3rd Tuesday.

TAS.:
President — Mr. I. F. Ling VK7XL
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Broadcasts— 7130 (SSB) kHz with relays on 6 and 2m Ch. 2 (S), Ch. 8 (N), Ch. 3 (NW), 09.30 EST.

NT:
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Broadcasts— Relay of VK5WI on 3.555 MHz and on 146.5 MHz at 2330Z. Slow morse transmission by VK8HA on 3.555 MHz at 1000Z almost every day.

Postal Information:
VK1 — P.O. Box 46, Canberra, 2600.
VK2 — 14 Atchison St., Crows Nest, 2065 (Ph. (02) 43 5795 Mon, Tues & Thurs 9.45-13.45h). P.O. Box 123, St. Leonards, NSW 2065.
VK3 — 412 Brunswick St., Fitzroy, 3065 (Ph. (03) 417 3535 Weekdays 10.00-15.00h).
VK4 — G.P.O. Box 638, Brisbane, 4001.
VK5 — G.P.O. Box 1234, Adelaide, 5001 — HQ at West Thebarton Rd., Thebarton.
VK6 — G.P.O. Box 10, W. Perth, 6005.
VK7 — P.O. Box 1010, Launceston, 7250.
VK8 — (incl. with VK5), Darwin AR Club, P.O. Box 37317, Winnellie, N.T., 5789.

Slow morse transmissions — most week-day evenings about 09.30Z onwards around 3550 kHz.

VK QSL BUREAUX
The following is the official list of VK QSL Bureaux, all are inwards and outwards unless otherwise stated.

VK1 — QSL Officer, G.P.O. Box 46, Canberra, A.C.T. 2600.
VK2 — QSL Bureau, P.O. Box 73, Teralba, 2284.
VK3 — Inwards QSL Bureau, Mrs. B. Gray VK3BYK, 1 Amery Street, Ashburton, Vic. 3147.
VK3 — Outwards QSL Bureau, Mr. D. J. Clarke VK3DES, C/o VK3 Rooms.
VK4 — QSL Officer, G.P.O. Box 638, Brisbane, Qld., 4001
VK5 — QSL Bureau, Mr. Ray Dobson VK5DI, 16 Howden Road, Fulham, S.A. 5024.
VK6 — QSL Bureau, Mr. J. Rumble VK6RU, G.P.O. Box F319, Perth, W.A. 6001.
VK7 — QSL Bureau, G.P.O. Box 371D, Hobart, Tas. 7001.
VK8 — QSL Bureau, C/- VK8HA, P.O. Box 1416, Darwin, N.T. 5794.
VK9, 0 — Federal QSL Bureau, Mr. N. R. Penfold VK6NE, 388 Huntriss Rd., Woodlands, W.A. 6018.

National EMC Advisory Service

Tony Tregale VK3QQ
Federal EMC Co-ordinator
38 Wattle Drive, Watsonia 3087

RFI Directory of Assistance

This directory is presented to promote a better community understanding of Radio Frequency Interference and to assist all who are associated with the Electronics Industry.

SOURCES OF ASSISTANCE IN RESOLVING RFI PROBLEMS

If you have a RFI problem we recommend that in the first instance you forward concise details to the National EMC Advisory Service. However, the manufacturers listed have volunteered to provide information and assistance, where possible, in connection with RFI problems associated with their equipment.

You are advised to ensure that all regular RFI investigations have been completed and all regular RFI precautions taken before contacting these manufacturers. Please help them to help you by providing as much information as possible in connection with the problem.

AKAI

We advise that requests for technical assistance should be directed to:—

The National Service Manager,
Akai Marketing Services Aust. Pty. Ltd.,
PO Box 309.
North Ryde, NSW 2113.

AWA — THORN — MITSUBISHI

RFI complaints concerning consumer products should be referred to the nearest Service Department listed below:—

Adelaide:
101 Main North Road, Nailsworth 5083.
Phone: 269 1966.

Melbourne:
123 Bamfield Road, West Heidelberg 3081.
Phone: 459 1688.

Brisbane:
73 Jane Street, West End 4101.
Phone: 44 7211.

Hobart:
10 Chesterman Street, Moonah 7009.
Phone: 72 4366.

Perth:
11Belmont Avenue, Belmont 6104.
Phone: 277 7788.

Townsville:
Cnr. Hamil and Schmid Streets, Townsville 4810. Phone: 79 6444.

Sydney:
348 Victoria Road, Rydalmere 2116.
Phone: 638 9022.

GENERAL ELECTRIC

Customer inquiries relating to RFI should be referred to the Rank Services and Distribution Centre located in each State, or in writing to the National Service Manager, Rank Service and Distribution, 296 Ferntree Gully Road, Notting Hill, Victoria. Phone: (03) 541 5555.

HAGEMEYER (AUSTRALIA) B.V.

Customer problems involving RFI should be referred to the Service Manager in the respective capital cities for investigation. Inquiries may be directed to:—

The National Service Manager,
5-7 Garema Circuit,
Kingsgrove 2208.
Phone: (02) 750 3777.

HEALING

RFI complaints should be directed to the Rank Services and Distribution Centre located in each State. Further inquiries can be made in writing to:—

The National Service Manager,
Rank Services and Distribution,
296 Ferntree Gully Road,
Notting Hill, Victoria.
Phone: (03) 541 5555.

HMV

Customer problems involving RFI should initially be referred to the Rank Services and Distribution Centre located i neach State. If problems are not resolved at this level then complaints should be made in writing and directed to:—

The National Service Manager,
Rank Services and Distribution,
296 Ferntree Gully Road,
Notting Hill, Victoria.
Phone: (03) 541 5555.

HITACHI

Any requests for technical information related to RFI should be directed to:—

The Technical Director,
Hitachi Sales Australia Pty. Ltd.,
153 Keys Road, Moorabbin 3189.
Phone: (03)555 8722.

KLARION ENTERPRISES PTY. LTD.

Service information can be obtained through:—

Melbourne:
Service Manager, 63 Kingsway, South Melbourne 3205. Phone: (03) 61 3801.
PO Box 379, South Melbourne.

Sydney:
Service Manager, Unit 3, 3 Lanceley Place, Artarmon 2064. Phone: (02) 438 1388.

Brisbane:
Service Manager, 199 Elizabeth Street, Brisbane 4000. Phone: (07) 229 2077.

Adelaide:
Service Manager, 35-37 Halifax Street, Adelaide 5000. Phone: (08) 212 2217.

Perth:
A. M. Hill Pty. Ltd., Unit 5/66 Wellington Street East, Perth 6000.

LUXOR

In the event of an RFI problem with a Luxor television set the customer may write to:—

The Manager,
Skantic (TV-HI/FI) Services Pty. Ltd.,
PO Box 141,
Mitcham 3132.

PIONEER

Requests for technical assistance in connection with RFI problems associated with "Pioneer" brand high fidelity and car sound audio products should be directed to:—

The National Service Manager,
Pioneer Marketing Services Pty. Ltd.,
178-184 Boundary Road,
Braeside 3195.
Phone: (03) 580 9911.

PHILLIPS-TMC

Any information or advice for problems on EMC on our products (Telecommunications) should be directed as follows:—

Product Manager — Service,
Philips TMC Radio Division,
PO Box 105,
Clayton 3168.
Phone: (03) 544 0366.

PHILIPS TV AND HI/FI

Any information regarding EMC in relation to our Consumer Products and Domestic Entertainment Products should be directed as follows:—

Technical Manager,
Philips Service,
PO Box 10,
Concord West 2138.
Phone: (02) 736 3611.

PYE CONSUMER PRODUCTS

We maintain a service department in each capital city, plus Newscastle, Townsville and Canberra and initial contracts regarding RFI problems should be made with the

Service Manager at the appropriate branch office. The address and telephone number will be found in the local telephone directory.

RANK ARENA

Customer problems involving RFI should initially be referred to the Rank Services and Distribution Centre, attention Service Manager located in each State. If problems are not resolved at this level then complaints should be made in writing and directed to:—

The National Service Manager,
Rank Services and Distribution,
296 Ferntree Gully Road,
Notting Hill, Victoria.
Phone: (03) 541 5555.

RANK ELECTRONICS

Requests for technical assistance in connection with RFI problems associated with our products should be directed to:—

The Managing Director,
Rank Electronics,
14 Suakin Street,
Pymble 2073.

RANK-NEC PTY. LTD.

Requests for technical assistance in connection with RFI problems associated with our products should be directed to:—

The Technical Manager,
Rank-NEC Pty. Limited,
25 Coombes Drive
Penrith 2750.

SHARP

All enquiries regarding RFI problems associated with our products should be directed to:—

The National Service Manager,
Sharp Corporation of Australia Pty. Ltd.,
PO Box 233,
Fairfield 2165.
Phone: (02) 728 9111.

SONY

Problems or enquiries relating to EMC in connection with Sony audio or video equipment should, in the first instance, be referred to the local Sony Australia office or authorised Sony Service Centre. If not satisfied, then the problems should be referred to:—

The Technical Services Division,
Sony Australia Pty. Ltd.,
453 Kent Street,
Sydney 2000.
Phone: (02) 20 221.

TEAC

All enquiries or complaints in regard to RFI associated with our products should be directed to:—

The Service Manager,
TEAC Australia Pty. Ltd.,
115 Whiteman Street,
South Melbourne 3205.
Phone: (03) 699 6000.

NATIONAL EMC ADVISORY SERVICE

Requests and information may be directed to:—

Federal EMC Co-ordinator,
Wireless Institute of Australia,
PO Box 150,
Toorak 3142.
Phone: (03) 528 5962.
Or home address VK3QQ, QTHR ■

RON WILKINSON ACHIEVEMENT AWARD 1981

The recipient of this highly prized Award for the year 1981 is Mr. Ray Jones VK3RJ in recognition of almost a lifetime devoted to the work of the Federal (and Victorian) QSL Bureaux.

The Executive resolved that two other nominations by the respective Divisions for this Award should receive honourable mention. These are the WIA Repeater Group with Gill Weaver VK6YL and Peter Smith VK1DS, of the ACT Repeater Section.

This Award was set up in March 1978 funded mainly from interest derived from the investment of $1100 donated by Mrs. Mary Wilkinson, widow of the late Ron Wilkinson VK3AKC, in his memory. The qualifications for the Award are as follows:

The Award is for special achievement in any facet of amateur radio. The following examples illustrate the level of achievement which will be taken into consideration in making the Award:—

Outstanding communication achievement.
Article for Amateur Radio Magazine.
Holder of Australian DXCC.
Development of state of the art techniques.
Involvement in Institute affairs.
Microwave activity.
Involvement in WICEN, Education Clubs or similar.
Achievement in using amateur satellites.
Notable Public Service.

These are only examples. As can be seen the Award is extended to cover the whole gamut of amateur radio activities.

(AR March 1978, page 17.) ■

EMC

(Electro Magnetic Compatibility)

If radio frequency interference is causing you a problem you are reminded that — "Advice on all types and aspects of interference (PLI, TVI, AFI, etc.) is available from the National EMC Advisory Service".

FORWARD DETAILS TO
VK3QQ,
Federal EMC Co-ordinator, QTHR.

WANTED

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- 2MHz - 30MHz continuous!
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- Digital frequency readout, with digital clock.
- Superbly easy to operate: set pre-selector, then tune!
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OPTIONAL MEMORY UNIT Gives you single button re-call of any of 12 chosen frequencies. Great for monitoring, skeds, etc. Simple connection, instructions inc. **$149.50** D-2842

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FANTASTIC FT-107 DMS

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Problems with antenna mis-match on your FT-107? Not with this superb coupler. Designed to match the 107 styling, but just at home with any transceiver. Huge meters for power output and SWR. Superb quality!

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FT-902D our most popular HF transceiver

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The FT-902D has just about everything you've ever wanted in a transceiver. All modes (yes, even FM - great with transverters), & all bands from 160 to 10M (including WARC). You get digital readout, RF speech processor, rejection tuning, 180W PEP input, etc etc etc. So come in to one of our stores & check it out & ask for your free brochure.

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This coupler can feed anything from a random length of wire to a beam. Match the load perfectly so you can deliver more power up there where it's wanted! Suits all bands, has built-in SWR/pwr meter as well. 50 or 75 ohm system, 500W rating.

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The FT-208R transceiver brings a new flexibility to today's active 2M operator. An easy to read LCD display is coupled with a 4-bit microprocessor, bringing 10 memories & a scanning function. Only with Yaesu can you get these features at such an economical price. Check it out NOW!

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The Yaesu PA-2 is a mobile charger, come pwr supply. Suited for the FT207R & FT208R. Uses the power from your 12V battery when mobile. Also recharges nicads in your battery pack.

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FT 290R

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ALL MODE FM/SSB/CW

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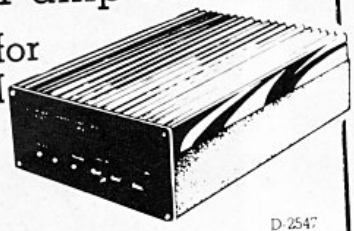
ONLY $395.00

NEW! NEW
VHF Power boosted linear amp FL-2050

Ideal for all 2M rigs



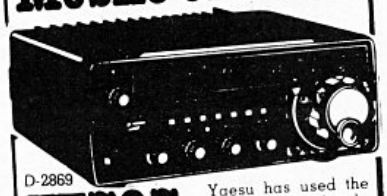
D-2547

Add this to your hand held for real mobile power. Also suitable for SSB, CW, AM etc. Operates from 13.6V DC up to 15W input for maximum power. Includes 12dB receiver pre-amp, with automatic transmit receive control.

ONLY $239.00

DICK SMITH WILL BEAT ANY GENUINE PRICE ON YAESU EQUIPMENT

Mobile or base



D-2869

FT707 Yaesu has used the 'state of the art' technology & put it into such a tiny package. Yes, it's the brilliant FT-707. This little wonder contains all the outstanding features that most big rigs lack. It's a full power, all HF band (inc. WARC) multi mode transceiver. You get digital readout, LED S/power meter, push button operation all the things the amateur needs for safe reliable operation. You've waited a long time for a rig like this, so take the splurge now, it's well worth the money.

ONLY $795

Antenna Coupler

Get the most from your FT-707, use the Yaesu FC-707 antenna coupler & ensure your transceiver always delivers the power it should. Has all the features you need: pwr/SWR meter, in-built dummy load, all band coverage (including WARC), less than 0.5dB insertion loss

D-2875 **ONLY $149.50**

Base operation?

Just add the FP-707 mains supply & you're away. You get fully regulated 13.5V at 20A. Has plug-in connections so you can't cause problems, plus you get an extra speaker - for greater clarity D-2895

ONLY $175

Digital VFO

Long n'slim - intended to sit under the 707. 12 memories, up/down scanning in 10Hz steps & receiver offset tuning. Power by FT-707. D-2896

ONLY $299.50

Mobile bracket

Don't let your valuable 707 jump all around the car. Fit it in this superb mounting bracket for safety & security. Also holds the digital VFO. A must for the serious mobile operator. D-2897

ONLY $36

Yaesu's top 2 metre FT 480R has FM/CW & SSB

10% OFF

Yaesu call this their 'total performance VHF computerised transceiver.' And total performance it is! As the top-of-the-line Yaesu 2M family you'd expect a lot. You get FM, SSB CW over the full 2M band, with two VFO's, four memory channels, scanning, digital readout, hi/lo power switch & much, much, more. To sum it up in one word, superb!

D-2887

ONLY $525

NEW!
FT 101Z FM

The famous FT101Z plus FM at a bargain price! **$885** D-2872

DC-DC Inverter

Want to go mobile? Add this superb DC/DC inverter to your car battery. (13.5V nominal). Don't tie yourself to your shack - get out to where the DX is great! D-2864

ONLY $77

FL-2100Z 1.2kW Linear Amp.

If you want a linear amp built like a 'power house', that gives you a clean, strong signal, try the new WARC FL-2100Z. Australian amateurs can be assured that at our maximum legal limit of 400W PEP the FL-2100Z is just 'coasting' resulting in years of extra life. It features twin cooling fans for reliable operation & gives plate voltage, VSWR & DC readings from its two large meters. Suits virtually all amateur transceivers on the market

ONLY $580 D-2548

.DSE/A180/PAI

AMATEUR CALLBOOKS

Foreign Radio (Not incl. USA) The Foreign Callbook contains over 300,000 licensed radio amateurs in countries all over the world, giving call letters, name and address. Ideal for DXers ..... $21.95 Cat B-2262

United States N, K & W Listings Contains call letters, class name and address of over 300,000 licensed radio amateurs in the U.S. ..... only $22.95 Cat B-2260

DICK SMITH ELECTRONICS

Order Value	Charges
$5-$9.99	$1.20
$10-$24.99	$2.20
$25-$49.99	$3.30
$50-$99.99	$4.40
$100 or more	$6.00

These charges for goods sent by Post in Australia only - not Airmail, overseas or road freight

UHF Repeaters in Victoria

Peter Mill VK3ZPP

In 1980 Philips TMC, head office located at Clayton, donated a number of Pye Westminster W15U mobiles to the WIA. These were divided between the Divisions.

The Victorian Division was fortunate enough to be allocated three of these units. The task of finding a use for our three units was given to the Victorian Division's Melbourne based Repeater Group which was, at the time, responsible for the maintenance and updating of VK3RML, VK3RMM and the portable two metre WICEN repeater.

There were two things we could have done, one was to have decided that it was going to cost too much to develop these units and let them gather dust. The second, and the option we chose, was to approach the Council of the Division for funds to develop these units as mobile and/or WICEN repeaters for use by the amateurs of Victoria.

One antenna engineering diplexer model 4LD-450S was purchased for each repeater.

Each of these units were developed differently, so we will discuss each one separately.

VK3RCU — MT. MACEDON

It was decided that the first unit would be developed as a WICEN and general mobile repeater on Mt. Macedon as a support for the existing WICEN and general mobile repeater VK3RMM on two metre 6850.

The frequency allocated by the Victorian Division's Technical Advisory Committee was 434.275 MHz input and 439.275 MHz output. The unit was modified and installed on Mt. Macedon. The exciter of the W15U had to be modified to eliminate excessive noise being generated due to the W15U operating outside its frequency range.

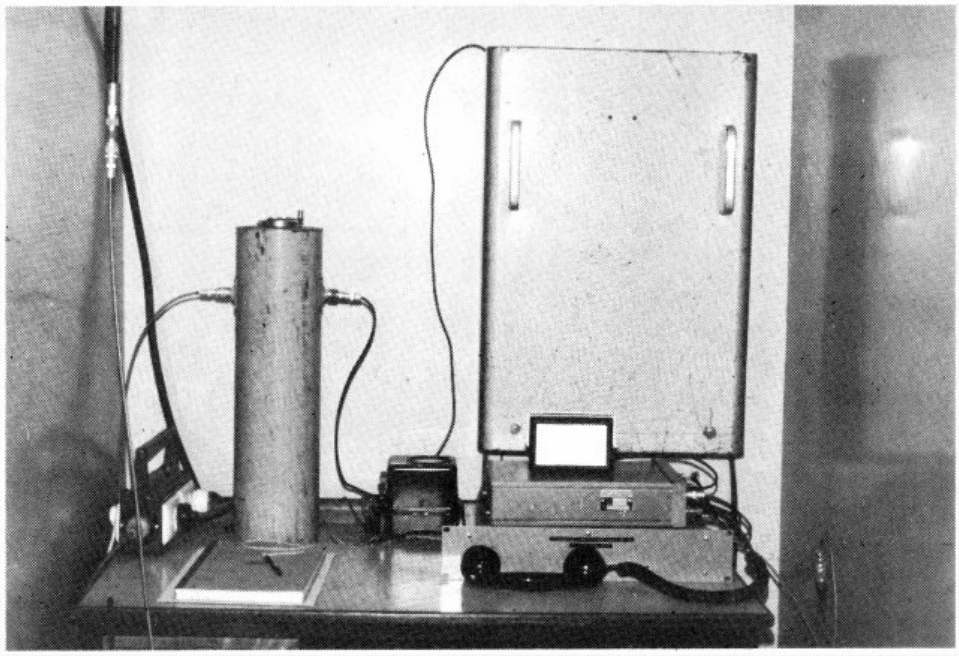
After being in operation for a few months we decided to try and increase the output power. Philips were again contacted and they donated an FM 828U power amplifier assembly. (828U is Phillips' current mobile.) This increased the power from five watts to 48 watts output.

The aerial used was a Scalar 6 dB GSA46. No experiments have been conducted with different antennas due to limited access to the tower.

VK3RNU — MT. STANLEY (Beechworth)

The frequency allocated was 433.525 MHz input and 438.525 MHz output. This unit was much easier to develop after finding out all the traps in VK3RCU. Once again we used a Scalar GSA46 antenna and a model 4LD-450S diplexer.

The repeater was modified in Melbourne. We enlisted the aid of Brian VK3AFN to help maintain the repeater. Brian also supplied and built a fifteen watt power amplifier for the repeater.



Inside the hut at Mt. Macedon. VK3RCU on the table and VK3RMM on the wall.

VK3RWI

VK3RWI — PORTABLE WICEN

The frequency allocated was 433.625 input and 438.625 output. This allocation is not one of the ten mobile repeater channels, as it was felt that an exclusive frequency was needed so that the repeater could be located anywhere in the State. As per the DOC guidelines, this repeater has no ident or timer. It delivers the standard five watts output.

It has been modified so that it may easily be interfaced with most sideband transceivers. This enables WICEN control to operate two 80 metre nets from the one headquarters. (One direct and the other remotely controlled using UHF via VK3RWI.)

Scalar Industries kindly donated a GSA46 antenna for use with VK3RWI.

Col VK3BLE accepting the Scalar antenna from Frank Welsh VK3BPV, Managing Director of Scalar.

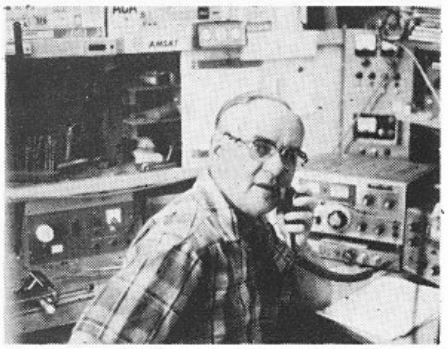
CONCLUSION

This is just a brief outline of how the VK3 Division utilized their W15Us. The VK3 Division Repeater Group would again like to thank Philips and Scalar Industries for their assistance in making these repeaters possible.

Hope to hear you mobile on 70 cm FM.

WIA Victorian Division Melbourne Repeater Group. ■

AMSAT AUSTRALIA



R. C. Arnold VK3ZBB

INFORMATION NETS

CONTROL: VK3ACR.

1000Z Sunday, 3680 kHz winter, 7064 kHz summer.

AMSAT-PACIFIC

CONTROL: JA1ANG.

1100Z Sunday, 14305 kHz.

AMSAT-SW PACIFIC

CONTROL: W6CG.

2200Z Saturday, 28880 kHz.

PREDICTIONS

For updated predictions for March listen to the weekly informations nets.

A DXpedition for satellite operation has been arranged by Ernie VK3DET during March and April this year.

Ernie will have gear for use with both Modes A and J and will operate from the following exotic locations in the Pacific:—

Western Samao: 5W1DW, 3rd-8th March, 1982.

Nieu: ZK2, 10th-24th March, 1982.

Tonga: A35, 26th March-16th April, 1982.

Ernie will also operate on HF bands. Listen to the AMSAT-Australia net for updated information.

AMSAT-Oscar 8 continues to operate satisfactorily with good contacts via Modes A and J. The satellite's temperature is now falling from the high levels experienced during the past few months. This will increase the longevity of the satellite.

UOSAT-Oscar 9, as at late January, was not fully operational. It is understood that there has been some difficulty with the command antenna and potential operators are asked to be patient. Meanwhile information via the 145.825 MHz telemetry channel is received consistently, and on occasions the 435.025 beacon has been heard transmitting CW.

The most recent Russian amateur satellites, RS3 to 8 inclusive, are operating well and a number of contacts have been made via both the transponder and the robots. Reports from amateurs accessing the satellites would be appreciated. Orbital parameters as at 24th January are:—

Satellite	Time per Orbit Minutes	Long Increment °W
RS3	118.518838	29.756440
RS4	119.395006	29.975680
RS5	119.555111	30.015691
RS6	118.717730	29.806231
RS7	119.196669	29.926063
RS8	119.765374	30.068304

As mentioned last month, I received a most interesting letter from Colin Hirst VK5HI, which outlines some of the work he has done with data from UO9.

Colin has been interested in data decoding for many years, particularly to evaluate the spin and tumble rate of Oscars 6, 7, 8 and now 9 — that's almost a ten year period.

For UO9 Colin finds the magnetometer experiment provides the most useful data to evaluate the spin and tumble rate which at the time was significant. Unfortunately a long delay in mail due to the postal strike made his figures less meaningful, so I will not quote them at this late stage.

Colin runs a System 80 computer to print his data. He can store 2½ minutes worth of 1200 baud ASCII in RAM and he then uses a routine to dump in baudot at 45.45 baud and print out in 40 minutes. As he says, "Beggars can't be choosers".

There are some interesting comments on decoders. Colin's home brew decoder works extremely well up to the 1200 baud ASCII with only a small loss of information due to QSB (not necessarily your fault, Col). Graham VK5AGR is using the AMSAT-UK design which appears to be excellent up to 300 baud, but poor on 1200 baud. Colin and Graham are hoping to evaluate copies of the USA design decoder and I hope they will report their findings. Perhaps one of them could write an article on the best design, for publication in Amateur Radio.

Thank you, Colin, for your initial report, I look forward to hearing from you and others again.

After the launch of an amateur satellite both Charlie VK3ACR and I receive a number of enquiries for further information, generally from amateurs who are interested in satellite communication. The launch of UO9 produced an even greater volume of enquiry but this time many calls came from a new source — the computer operator or one interested in the acquisition of the UO9 pictures. Many of the enquirers had no knowledge of radio, the Wireless Institute or the various AMSAT Groups.

In the past, specialist groups interested in receiving and transmitting data, e.g. RTTY have been entirely made up of licensed amateurs but now we note interest by a much broader group who see amateur radio only as an adjunct to developing technology.

Decoding of satellite data transmissions started with Oscar 1 over 20 years ago, but it is only recently that persons other than radio amateurs have joined the small group of satellite enthusiasts.

Perhaps it is timely that the WIA should consider the growing interest in data transmission and be in a position to respond to the inevitable lobby, seeking an allocation of the radio spectrum for this hobby.

We welcome the new enthusiasts and will give them every encouragement to assist them to become radio amateurs, thus giving them the facility to access the satellites.

We are aware that several tertiary students in Melbourne have presented theses on the mathematics of orbiting bodies using our amateur satellites as examples. They have also written quite sophisticated computer programmes as an adjunct to their studies. Congratulations to those students whose papers were accepted by the authorities.

AMSAT-AUSTRALIA

Co-ordinator: Chas Robinson VK3ACR.

AR Notes: Bob Arnold VK3ZBB.

Correspondents: VK2RX, VK3KF, VK3KW, VK3YQX, VK4PJ, VK5HI, VK5AGR, VK7PF. ■

STOP PRESS

A spectacular end-of-season 2 metre opening occurred on Sunday, 31st Jan., 1982, when at 1005Z Ross VK4RO in Ayr started a sequence which resulted in him working the following stations on 144.100 SSB: VK5ZMJ, VK5AIM, VK5RO, VK5LP, VK5ZDR, VK5ZRO, VK5ZPS, VK5KEN and "half a contact" with VK5AVQ. Signals varied from around S3 to S9+ and the opening continued until about 1113Z.

At the same time Lloyd VK4ZYA in Townsville worked VK5RO, VK5AIM, VK5KEN, VK5ZRO and VK5KK. The distance to VK5KK from VK4ZYA would have been about 1860 km (1155 miles) and probably represents one of the longest ever all-land contacts on 2 metres to emanate from SA.

It seems likely the contacts were via Es. Although the signals from the same stations on 6 metres at the same time were S9, they were not of the strength one has come to expect when the MUF goes so high. There was a complete absence of short-skip stations, e.g., VK5 to VK3, but this may have been more a function that at the time no one would be on 6 metres in Melbourne anyway.

It was a big thrill for all concerned and once again indicates the end of January/early February is often a rewarding time on 2 metres to somewhere. With the running down of Cycle 21 we can expect a slight increase in this type of propagation for the next 5 to 7 years.

Tests were carried out by a number of stations on 432.100 MHz at the time the 2 metre signals were available but nothing heard. ■

A dog would make a much more satisfactory pet if, instead of whimpering when a thunderstorm breaks in the middle of the night, it would tiptoe in and close the windows.

Reproduced from UOSAT Technical Handbook, AMSAT —

SERVICE MODULES

Power Systems (Dr. Karl Meinzer, Univ. Marburg AMSAT-DL, Germany, Jerzy Slowikowski, UOS/AMSAT-UK)

Four solar arrays each of 408 2 x 2 cms cells fabricated by SOLAREX Corp. (USA) provide 28 watts each at a nominal 32 volts when fully illuminated. The total average power available from the arrays, allowing for sun angle and eclipse periods, will be around 17 watts. One of two redundant Battery Charge Regulators (BCR) regulates the solar array power to the 14V 6AH 10-cell NiCd battery with an efficiency of approximately 90 per cent, whilst the Power Conditioning Module (PCM) delivers regulated power supplies of +10V (1 per cent), —10V (5 per cent), +5V (5 per cent) with a total capacity of 10 watts and with an overall efficiency of about 87 per cent. The average continuous power budget available to the spacecraft electronics from the battery bus and PCM is around 11.5 watts.

The spacecraft consumes around 9.8 watts from the PCM when all experiments are operational with a further 10.5 watts from the unregulated battery bus. Power is distributed around the spacecraft through a central Power Distribution Module which, under the control of the Command System, provides switched power supplies to the various experimental and service modules whilst also allowing central telemetry monitoring facilities. The power switches exhibit resettable current foldback in the event of malfunction.

Telecommand System (Dr. Martin Sweeting G3YJO, UOS/AMSAT-UK)

Two modes of control over the spacecraft are available, with a repertoire of 66 latched, two-state commands:

1. Direct, real-time control of the spacecraft's functions by Ground Command Stations using one of two redundant VHF/UHF command receivers.
2. Indirect, stored-programme control executed by one of the two on-board microcomputers according to a "diary" loaded in advance from a Ground Command Station via the telecommand uplink.

Any valid command data emanating from the Ground Stations have an overriding precedence with any command data simultaneously issued by the on-board microcomputers. The primary computer (RCA 1802) has precedence over the secondary computer (F100L), unless otherwise instructed from the ground. The Telecommand uplinks also carry high-speed data to enable programme software and data to be loaded into the on-board microcomputers.

Antenna Systems (Tony Brown, UOS/AMSAT-UK, Dr. Mike Underhill, PRL, UK)

7-13-21-28 MHz Beacons Expt.: Centre-fed, "V" dipole of 2.5 metres each arm. Fed via a narrow-band matching network. Linear polarisation.

145 MHz General Data Beacon: /4 canted turnstile fed via /4 semi-rigid coaxial hybrid, l.h.c.p., + 3 dBi gain.

435 MHz Engineering Data Beacon: Same antenna system and hybrid feed as above operating on harmonic overtone. l.h.c.p., + 5 dBi gain.

2.4 GHz Beacon Expt.: 3.5 turn helix, l.h.c.p., + 6.5 dBi gain.

10.47 GHz Beacon Expt.: 4 turn slot helix, l.h.c.p., + 8 dBi gain.

All polarisations are given according to the IEEE definition. The circularity of the polarisation will tend towards elliptical at low elevation angles.

Navigation Magnetometer (Dr. Mario Acunia, AMSAT-USA, Christine Sweeting, G6APF, UOS/AMSAT-UK)

A three-axis, flux-gate magnetometer mounted on the upper (+z, +x) facet of the s/c wing will provide information on the orientation of the s/c in orbit by the comparison of measured earth magnetic field vectors with existing modes. It is anticipated that the navigation magnetometer will be able to determine the orientation of the s/c to within 2 degrees. Solar cells mounted on the top and bottom (+z and —z) facets of the s/c resolve the up/down ambiguity. The data from the magnetometer is available in real time through the telemetry system.

To be continued ■

AWARDS COLUMN

Bill Verrall VK5VW
7 Lilac Avenue, Flinders Park, SA 5025

Here is a list of WIA Awards issued during the period 1st July, 1981, to 31st December, 1981, and the top DXCC tallies, new members and amendments as at 31st December, 1981.

WAVKCA AWARD

Cert. No.	Call Sign	Cert. No.	Call Sign
955	K1BV	989	JA1ATF
956	JA3HCN	990	DK7PX
957	JA3MNP	991	LA2CQ
958	JA2NYT	992	JH1NTG
959	IT9YRE	993	OK1ABB
960	JA7DY	994	G4AXD
961	JA7ULO	995	HM5LE
962	DJ7AT	996	VK6YL
963	KN6M	997	VK2HD
964	LA6OT	998	JA5PWW
965	A4XIH	999	G4BYK
966	JA1DSI	1000	VK5WV
967	JH6KXG	1001	UB5JR
968	JA4CTL	1002	UA6JAD
969	JA4AO	1003	UA1CY
970	JA8FBH	1004	UK2BAS
971	JA3GIY	1005	UD6CN
972	JH2QAY	1006	UK0FAD
973	DF4FO	1007	RA9CIU
974	JA2ALS	1008	UB5ZEL
975	DL3RK	1009	UA1DF
976	DJ2EA	1010	UK5IAZ
977	KB7SC	1011	UK3TBF
978	PA0EHL	1012	UB5HDX
979	JR1FYS	1013	UV9DT
980	PA0MA	1014	JA2CEJ
981	W7KTI	1015	JA1PS
982	K7CU	1016	OK2BUJ
983	PA0GT	1017	9V1TL
984	PA0TV	1018	K7SE
985	LU1SE	1019	WB6GFJ
986	YC1GJ	1020	ZS4CF
987	I2YBC	1021	GM3TDS
988	JH6SAK	1022	JH2RMU

WAS (VHF) AWARD

Cert. No.	Call Sign
144	VK3DU
145	VK2YSX
146	KG6JDX
78	VK3AKK (amendment) plus 17 additional countries

VHFCC AWARD

Cert. No.	Call Sign
108	VK3NM (52 MHz)
109	VK4ZSH (52 MHz)
110	VK5AN (52 MHz)
111	VK2BJC (52 MHz)

HAVKCA (SWL) AWARD

Cert. No.	Call Sign
54	W2-6893, Nathan Rosen.
55	L60036, Peter K. Dean.
56	L31345, Henry Wallis.
57	HE9OZH, Fri Zwingli.
58	UB5-073-389, Vlad N. Olejnik.
59	UA3-122-780, Kremnew Andrey.
60	UR2-083-913, Tahtla Hugo.
61	UA1-169-185, Victor I. Kotin.

DXCC — TOP LISTINGS (All at 275 and over)

PHONE

Call Sign	Tally	Call Sign	Tally
VK5MS	318/360	VK6NE	297/304
VK6RU	317/362	VK3AKK	297/299
VK4KS	317/349	VK3AHO	294/326
VK5AB	315/345	VK2APK	293/313
VK6MK	313/350	VK4UC	293/306
VK3JF	308/320	VK6FS	292/294
VK6LK	307/321	VK3OT	292/293
VK4VC	307/318	VK5XN	289/302
VK4FJ	306/343	VK7AE	289/291
VK7LZ	306/323	VK3RF	283/285
VK7DK	304/319	VK6YL	283/284
VK4RF	304/314	VK7BC	280/283
VK3AMK	303/312	VK6IR	277/278

VK5WV	302/314	VK3DU	273/275
VK6HD	298/305	VK4BG	272/282
VK4PX	297/312	VK4DO	261/281
VK4AK	297/306		

CW

Call Sign	Tally	Call Sign	Tally
VK2QL	310/349	VK3YD	281/313
VK2EO	309/346	VK4RF	277/298
VK3YL	308/336	VK6RU	261/300
VK4FJ	302/345	VK3NC	261/297
VK3AHQ	299/331	VK3RJ	255/281
VK3XB	286/314	VK7LZ	253/283
VK2APK	283/304		

OPEN

Call Sign	Tally	Call Sign	Tally
VK6RU	317/362	VK4AK	297/307
VK4KS	317/353	VK7BC	297/301
VK4SD	317/348	VK3AKK	297/299
VK3YL	316/348	VK2SG	296/314
VK6MK	313/350	VK4UC	296/310
VK4FJ	312/356	VK3OT	295/296
VK4RF	312/336	VK3AHO	294/326
VK3JF	312/332	VK3XB	292/320
VK6HD	309/322	VK5WO	284/307
VK7LZ	307/339	VK5RX	282/313
VK7DK	305/320	VK2AHH	279/305
VK4PX	304/323	VK4BG	279/292
VK3AMK	303/312	VK4DP	278/287
VK2APK	301/329	VK4DO	269/296

DXCC — NEW MEMBERS

PHONE

Cert. No.	Call Sign	Tally
270	VK8NDN	100/101
271	VK6NE	297/304
272	VK3NXU	100
273	VK4FS	109
274	VK1MM	103
275	VK5ATA	141
276	VK2VRU	114
277	VK2DPN	201
278	VK3BDL	106/110
279	VK3DBV	100
280	VK5PS	107
281	VK5BW	106/110
282	VK5KOT	103
283	VK3BMA	108
284	VK2DPB	99/100

CW

117	VK3BLN	109
118	VK5ARA	102

OPEN

204	VK5MB	98/100
205	VK3QB	111
206	VK5UD	108

DXCC — AMENDMENTS

PHONE

Call Sign	Tally	Call Sign	Tally
VK2PY	173	VK5BO	151
VK3DS	201/207	VK5WO	254/272
VK3GB	211/229	VK5NVW	151
VK3BLN	253/254	VK6RO	209
VK3DFD	250/251	VK6AJW	239
VK3NLS	144/145	VK6NAT	204/205
VK4CZ	267/274		

CW

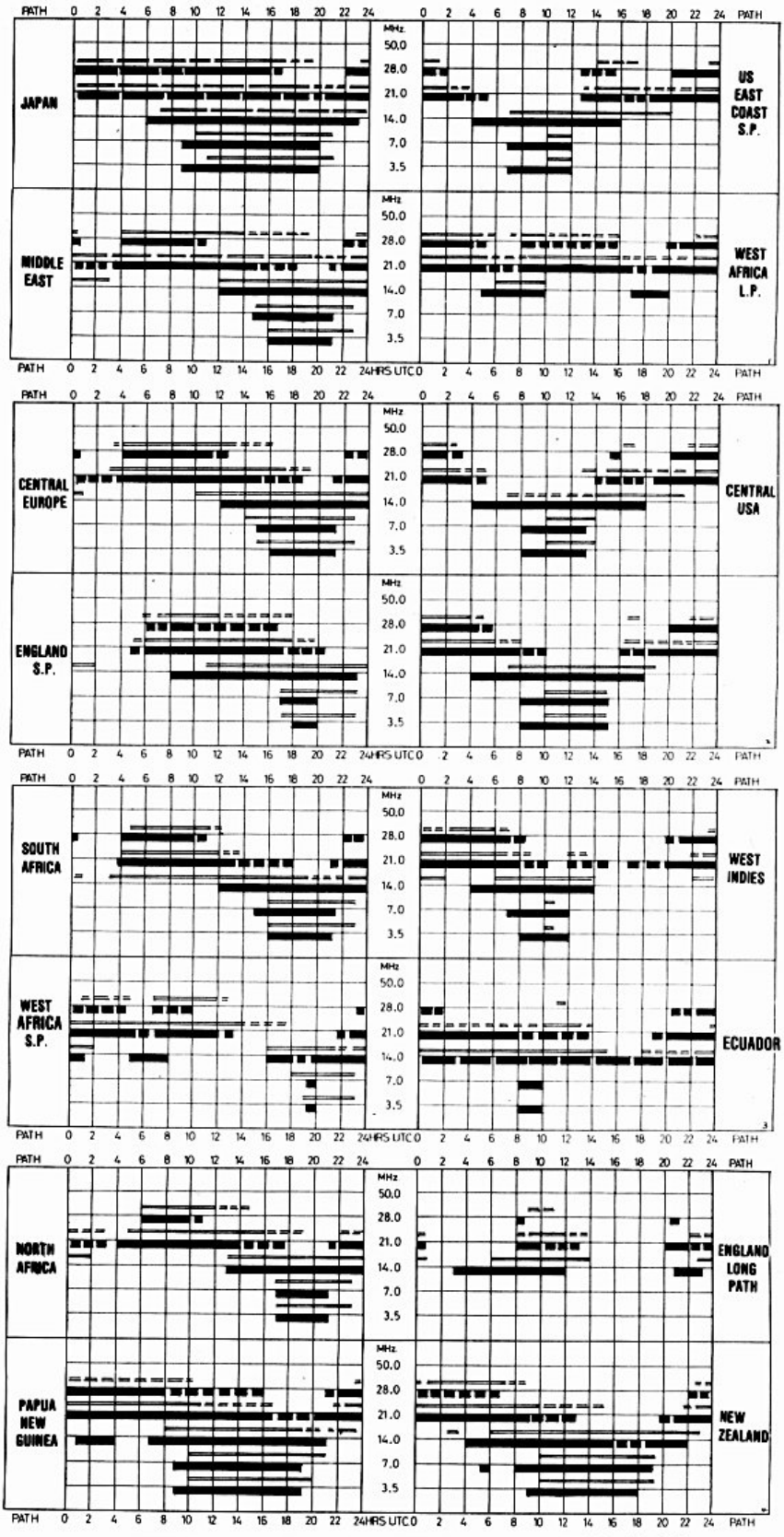
VK3JF	222/237	VK5BO	161/183
VK4DO	208/232	VK7BC	149/151

OPEN

VK3AXQ	146/150	VK5BO	239/271
VK3BLN	257/258	VK5ARA	175
VK3NLS	158/159	VK6NAT	205/206

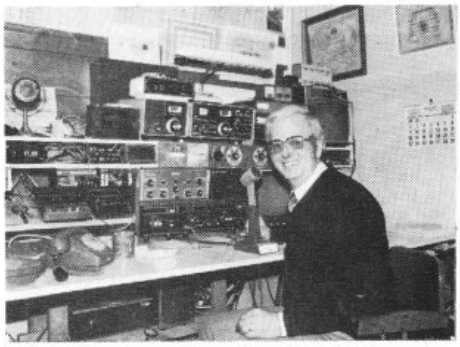
■

Len Poynter VK3BYE



Predictions courtesy Department of Science and Environment IPS Sydney.
All times universal UTC (GMT).

HOW'S DX



Ken J. McLachlan VK3AH
PO Box 39, Mooroolbark 3138

Ten metres proved to be useful but erratic with some excellent openings at unexpected time, fifteen reliable with good pickings to be had for those that tuned around and twenty metres a little disappointing, but good QSOs were possible even with "Woody Wooodpecker" trying his hardest to get into the act without an invitation.

An interesting experiment was carried out with a DL station who reduced power from one kilowatt in gradual steps to five watts. Signal strength naturally deteriorated ending up around 5 by 6 and unfortunately he could not go lower in power. This was on ten metres with little or no QRM which is typical in this part of the amateur spectrum. It was apparent that very few VKs even check this segment of our allocation let alone use it, according to the demand when the QSO was completed, so for that elusive country or zone check ten metres at regular intervals, you could be pleasantly rewarded.

GENTLEMAN'S AGREEMENT

The novice CW operator who operates fifteen metres is getting a poor deal due to some inconsiderates who classify themselves after passing the examination and gaining a call sign, as amateurs. Paul S. Segal, who wrote the Amateur's Code, quoted "The Amateur is Gentlemanly — he never knowingly uses the air for his own amusement in such a way as to lessen the pleasure of others". Unfortunately these "irresponsible button pushers" are violating a "GENTLEMEN'S AGREEMENT" which has existed for decades by infringing into the CW segment of the band. When reminded of the agreement, some openly declare that they are not gentlemen (this is already apparent by the tone of the conversation), refuse to QSY to allow the novices to work prime DX in their 25 kHz of the band and continue on with their "trivia". This creates a very poor image for all VK amateurs as well as depriving the enthusiastic operator of improving his or her skills to pass the exam and upgrade their licence.

Unfortunately, some of the fraternity because they have obtained unrestricted privileges refrain from being associated with someone who is only permitted to legally radiate low power, as if they may contract some contagious disease. Never would it enter their mind to assist them with their operating technique, Morse speeds, a rare DX station or most importantly, encourage them to upgrade. Novices comprise some 26 per cent of calls issued in this country, as against approximately 19 per cent in the USA, where it is believed integration between different levels is harmonious, the accent being placed on education and encouragement.

Fellow amateurs, how can we assist the majority of novices to enjoy the unrestricted privileges we take for granted?

Please don't put it in the too hard basket or leave it to the amateur down the street because it is our responsibility.

TN8 AGAIN

Popular amateur Jorg hoped to be back in the Congo Republic again using the call TN8AJ. Jorg has been active from this area over quite a period now and has accommodated many VKs with a new one through his manager Y25LO (DM2XLO).

Jorg has the privilege of being able to run one kilowatt and uses a dipole 5 metres above ground level for transmitting. The receiver is serviced by a long wire at the same height but 17 metres long. With this set up the DX score is 185. It has been said certain prefixes are worth a hundred countries and this proves it!

7Q7 AND 5H3

To abide by their wishes it would be advisable to refrain from indicating in any form that the correspondence is from or pertaining to radio on the outside of the envelope and opaque paper surrounds the card, return envelope and IRCs or "green stamp" (preferably the latter) as they can be cashed or traded with a minimum of fuss that apparently arouses less suspicion. Personally it is felt that an honest and reliable QSL Manager would be the best route.

ZD9 TR de C

ZD9BV (this will bring them out of the woodwork). Uli DK2OC advised members who join his excellent net that ZD9BV has equipment on the island and will take up his appointment as Postmaster this month. A good bet for that much wanted country would be to monitor Uli's net on 10m. For the successful the QSL route is via John W4FRU.

JABAL AT TAIR

Jabal Island will be activated by four French amateurs commencing the 17th of April. All bands 80 through 10 metres will be used and both CW and SSB enthusiasts will be catered for. If you are successful, QSL to W6ATQ (call book QTH 1980 onwards).

C31 ANDORRA

Gordon VK2DGS, who used the call C31WW whilst in Andorra is ready to commence the task of replying to all those QSL cards when the logs arrive from the UK. Gordon writes that cards will be replied to "starting with those who have so kindly sent IRCs (or bank notes), then those who have sent SASEs followed by those that have not. Eventually I hope to collect QSL cards sent to the 'buro' and these will be answered in time."

Evidently all was not plain sailing in C31, as some of the locals stole and destroyed a generator belonging to a French amateur, sugar in the petrol and graphite in the oil of another generator belonging to C31LM.

Now, who would like to go to Andorra for a "Hamming Holiday"?

PHILATELIC FRIENDS

Have you got a DX friend who collects stamps? I have many and they are delighted with two free bi-monthly colour magazines which are produced by Australia Post and air mailed direct overseas at no cost.

One magazine previews future issues of VK and Pacific area stamps whilst the other contains general and historical information about Australian issues. For further details contact in writing the Philatelic Mailing List, PO Box 259, South Melbourne 3205.

A DL DXer

DXing in Europe has its problems, especially trying to get through the pile-up on that rare one, but Tom DL5BAN seems to get the contact he wants without too much hassle and he has built up an impressive total in a short period.

Tom DL5BAN

Tom, who is sixteen, became interested in amateur radio through his father, DK4BW, who has been licensed for many years. Tom got the "bug" and encouragement from his father for him to share his equipment eventually allowed a new call sign to be heard in mid-1980. To date Tom has worked 277 countries and with only 191 confirmed dwells on the postman's visit each day.

DXing is limited due to his eleventh year studies which, as Tom says, "Are on schedule but it is a bit hard to get my priorities in order at times because I am very keen on joining in on a quick game of basketball or soccer and probably the DX bands would come first".

Tom, with his Dad, uses an FT101E, SB221 linear and a four element quad on 10, 15 and 20 metres, whilst a Delta-loop is pressed into service for 40 and 80 metres.

Tom's greatest experience was being a guest of WB0ZLH when they went mobiling from Missouri to California, visiting many "Hams" en route for an "eyeball QSO".

In Tom's words "this is where I learnt what the amateur spirit and hospitality was all about and the memories and friendships made will stay with me for many years to come".

DP0LEX

New prefix! New country? The Federal Republic of Germany postal authorities have issued the call sign DP0LEX to meteorologist Josef DK6RK for his stay at the Federal German Antarctic Base situated at Ataka Bay (for those with an atlas the co-ordinates are 70° 37′ S, 8° 22′ W). The IARU R1 News states in the report that "enrolment in the DXCC country list has been applied for". We wonder?

OOTC

The Old Old Timers' Club was founded in 1947 by Hubert Ingalls W1NQ. for eligible "veterans" who had been associated with amateur radio for 40 years or more. Originally there were 13 members but by the end of 1948 the membership had expanded to 41 members. It has grown to a membership of some 2000 participants representing all continents.

VK has been ably represented in the Club by Mrs. Austine Henry VK3YL, Austine has now been unanimously appointed an Assistant Director of the Club for the Southwest Pacific area in recognition of being a long-time supporter of the Club and her contribution to the hobby.

Austine VK3YL

Austine is well known for her adeptness with the key for over half a century and her dedication to chasing the elusive DX at unearthly hours of the day and night. In recent years Austine has interspersed her operating to include SSB, a transition which has gained her a place on the ARRL DXCC Honour Roll.

Most of Austine's exotic prefixes were worked from a multi-band dipole and it is only over the last couple of years that a triband beam has been used to direct the signal. The present day equipment in a comfortable, well appointed shack decorated with prestigious awards and photos of old friends, consists of a Drake TR7 into a FL2100 linear with an ATU in line to the antennae. Back-up is taken care of by the use of an 820S. Of course the original hand key is always at the ready.

Congratulations Austine on the honour which has been bestowed upon you. Any reader with 40 or more years experience who wishes to climb "off the shelf" and join the Old Old Timers' Club should contact Ray Meyers W6MLZ, 717 Anderson Way, San Gabriel, California, 91776 USA.

LATE TIPS

EL2HA has a sked each Saturday, 14.155 MHz at 8.30 UTC.

TR8DX every day, 14.220 MHz at 16.00-18.00 UTC.

VP2MH due from Navassa 15th March. Try Caribbean net.

4U1UN, CW operation only. Should be on now. Good luck to the CW enthusiasts.

MANAGER CHANGE

Alen VP2MM wishes to advise he has changed QSL managers. The new one is AB1U, address as per 1982 Call Book.

Ron LU5ZI, operating from South Shetland, advises his QSL route is via LU2A, Reinaldo J. Szama, C Correo 100, Suc 28. 1428CF, Argentina. (A green stamp plus an addressed envelope would be appreciated.)

The husband and wife team (pictured) of VE2AFU and VE2ABX makes for harmonious operation. Cora, "Chief Operator", does all the talking, whilst OM Rudi, "Sparks", is chief maintenance man.

Sincere thanks for this month's contributions go to VK1CC, VK3s PA, UX, VU, YL, BOE, CIF, DFD, VK4KA, LX, VK6s HD, IH, NE, XI and SWL L30042.

Good DXing and 73.

LISTENING CW WITH ERIC L30042

This month Eric has forsaken all others for the new 10 MHz band and has had a very enjoyable and busy time.

For the three week period Eric has logged 200 different CW stations, located in 23 countries on five continents.

The new band appears excellent for daytime interstate but not so productive DX-wise at night. Nevertheless excellent signals have been picked up from both interstate and overseas, with the overseas peaking around 07.00 and 19.00 UTC.

Eric has found the most popular CW frequencies to be around 10.105 and 10.115 MHz.

The most exotic DX heard by Eric was C6ABA, N7ET/DU6, EA6AU, FK0VU, LK1PD, P29DH, YJ8VU, ZS6ANW, 4U1ITU and 9K2DR.

QSLers OF THE MONTH

3D2FJ, 6Y5YL, 9X5SL, A35FB, C21NI, C31NM, EA9HG, FK0AD, HC4WA, KC6YC, KH3AB, SV0AA, T3AF, VP2MM, VP9HM, XE1FX, ZF2BN, ZS5KI.

QSL ADDRESSES

5H3BH — Box 4358, Dar Es Salam, Tanzania.
7Q7LW — Box 24, Mtaka Taka, Malawi.
9X5MH — Box 491, Kigali, Rwanda.
A4XCB — Box 8530, Salalah, Sultanate of Oman.
A4XHI — Box 8530, Salalah, Sultnate of Oman.
A4XHZ — Box 8530, Salalah, Sultanate of Oman.
A4XIW — Box 8530, Salalah, Sultanate of Oman.
A4XIY, 16 Potter Street, Black Rock 3193, Australia.
EA8AAU — Box 821, Las Palmas, Canary Islands.
KC4AAD — USRS Box 300, FPO, SanFrancisco 96602, USA.
SU1CR — Reda 50, Khedr Eltoony Street, Nasr City, Cairo
SV5YU — Box 749, Rhodes, Rhodes Island.
TA1CT — PO Box 902, Istanbul, Turkey.
VP8ANT — Box 146, Cambridge, England.
YASME — Box 2025, Castro Valley, California 94546, USA.
YI1BGD — Box 5864, Baghdad, Iraq.
YJ8NSW — PO Box 208, Ringwood 3134, Australia.

QSL MANAGERS

Managers shown in brackets.

3C0AC (N4NX)	TA1KS (G3SCP)
3C0BC (K4PHE)	TL8RC (F6EZV)
3D2RF (VK3VU)	VK9YA (VK5QX)
4K1A (UA3AJL)	VK9YB (VK5QX)
5N0KUY (JI1IMI)	VK9ZH (VK6YL)
9U5WR (SP6FER)	XZ5A (JA8BMK)
9X5SL (DL8DF)	XZ9A (JA8BMK)
KV4AA (K6PBT)	ZD9BV (W4FRU)
OD5RZ (VE5QY)	

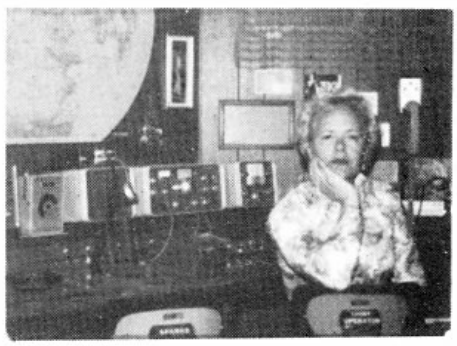
SSB WORKED ON THE WEST COAST

10/CR9AN, 10/FY7BY, 10/J3AH, 10/JX6BAA, 10/M1C, 10/M1V, 10/TR8LJ, 10/VK9ZH, 10/YI1AS, 10/ZD7BW, 15/7Q7LW, 15/8P6OR, 15/VK9ZH, 20/4K1A, 20/HH2JD, 20/HK0FBF, 20/HZ1TA/CN8, 20/K0AN, 20/TA1CT, 20/VP2MH, 20/W6QL/8R1, 20/ZL4OY/A.

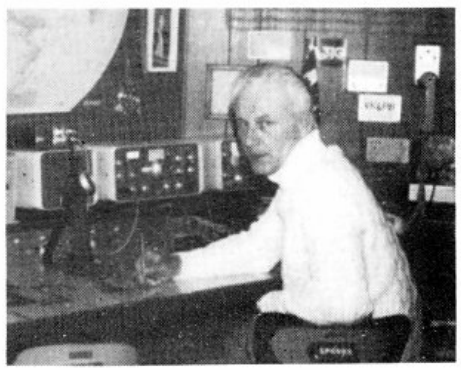
SSB WORKED ON THE EAST COAST

15/3B8CA, 15/4U1UN, 15/9N1BMK, 15/A4XHZ, 15/CR9AN, 15/EA9JV, 15/LU5ZR, 15/VK9ZH, 15/ZP5MJV, 20/5H3BH, 20/6Y5MJ, 20/9X5SL, 20/A71AU, 20/A9XDO, 20/A9XP, 20/CN8AT, 20/EA6DW, 20/EL2HA 20/FR7ZN, 20/HS1AMO, 20/HV3SJ, 20/TR8DX, 20/TU2RL, 20/UF6FFF, 20/UG6GAF, 20/VP2KT. ■

Faces Behind the Key and Microphone



Cora VE2AFU



Rudi VE2ABX

VHF-UHF
AN EXPANDING WORLD

Eric Jamieson, VK5LP
Forreston, S.A. 5233

VHF/UHF BEACONS

Freq.	Call Sign	Location
50.005	H44HIR	Honiara
50.005	VS5VHF	Natal, South Africa
50.008	JA2IGY	Mie
50.020	GB3SIX	Anglesey
50.023	HH2PR	Haiti
50.025	6Y5RC	Jamaica
50.035	ZB2VHF	Gibraltar
50.036	HC1JX	Quito
50.038	FY7THF	French Guiana
50.040	WA6MHZ	San Diego
50.048	VE6ARC	Alberta
50.050	ZS3E	South Africa
50.062	PY2AA	Sao Paulo
50.070	YV5ZZ	Caracas
50.080	TI2NA	Costa Rica
50.088	VE1SIX	New Brunswick
50.100	KH6EQI	Pearl Harbour
50.498	5B4CY	Cyprus
51.022	ZL1UHF	Auckland
52.013	P29SIX	New Guinea
52.150	VK5KK	Arthurton
52.160	VK0WW	Macquarie Island *
52.200	VK8VF	Darwin
52.250	ZL2VHM	Palmerston North
52.300	VK6RTV	Perth
52.320	VK6RTT	Carnarvon
52.330	VK3RGG	Geelong
52.350	VK6RTU	Kalgoorlie
52.370	VK7RST	Hobart
52.400	VK7RNT	Launceston
52.420	VK2WI	Sydney
52.425	VK2RGB	Gunnedah
52.435	VK3RMV	Hamilton
52.440	VK4RTL	Townsville
52.510	ZL2MHF	Mt. Climie
53.000	VK5VF	Mount Lofty
144.400	VK4RTT	Mt. Mowbullan
144.420	VK2WI	Sydney
144.475	VK1RTA	Canberra
144.550	VK5RSE	Mt. Gambier
144.600	VK6RTT	Carnarvon
144.700	VK3RTG	Vermont
144.800	VK5VF	Mt. Lofty
144.900	VK7RTX	Ulverstone
145.000	VK6RTV	Perth
147.400	VK2RCW	Sydney
432.410	VK6RTT	Carnarvon
432.440	VK4RBB	Brisbane
432.450	VK3RMB	Mt. Bunningyong

* Indicates a new beacon listing.

A message from VK7KJ indicates the VK0WW beacon has been re-activated after some years of silence and is running low power and has been heard in Tasmania occasionally. It is understood to be operated by Alan VK0AM but he has no 6 metre gear to support the operation of the beacon.

SIX METRE SUMMARY

I asked John VK5ZBU for an outline of how he saw 6 metres over the past few months, and here is his report:—

"September started things off, but not with any of the exotic signals expected, mainly openings to JA and most call areas, with some very strong signals. Similar pattern for October, when the solar flux again approached the 300 mark, but most activity seemed to have been confined to the northern hemisphere; viewed from VK5, not really an exciting period!

"November saw the beginning of what appears to be a return to the mid-cycle or, as some say, the mid-hertz type of propagation. Signals from most States began reaching VK5, back scatter was prevalent, with all States being available (except VK8) on 17/11. On 18/11 Bob VK6BE heard two VK5 stations on 146.540 discussing 28 MHz antennae, the FM signals did not last for more than a few minutes. During the latter part of November JA signals were very strong and lasted for some hours, also TV signals were being heard from a number of areas. (Even the "Pirates" were in evidence!) PY0 was reported by VK5ARZ on 50.125 and Andy VE1ASJ worked Bob VK2ASZ, no further details. An interesting aspect of recent openings has been the re-appearance of a number of stations not heard for some years; having re-discovered "six" they appear to be enjoying themselves.

"With the coming of December came the good contacts 'across the pond' to ZL. Along with the regulars came many new call signs, which it may be expected will increase, with the change of regulations in ZL allowing stations previously operating but not permitted on 52 MHz to be heard. Some administrations learn fast!

"An interesting contact with the Boulder, W.A., area was with Bill VK6ZX and Dianne VK6KYL, making their first 6 metre QSOs and were loud and clear into Adelaide using low power and a quad looking the wrong way and not rotatable! An ominous sign that 'Hertz-21' may be going "that-a-way' is noticeable in the return of VK6 and VK7 signals plus more recently VK8 Darwin and, of course, the lack of more distant signals. As the sun sinks in the west, one may reflect on what may have been achieved had we been able to work 50 MHz as acknowledged members of the world!" Thanks, John.

WORKED ELSEWHERE

The latest news from Bill W3XO of QST's "The World Above 50 MHz" is a ripper! What we here in Australia have missed out on is just incredible. We have missed out not only because we cannot use 50 MHz but propagation conditions have certainly not favoured the southern hemisphere anything like what has occurred in the northern hemisphere, plus the fact that there are more active stations in countries closer together than down here. Anyway, having got that off my chest, let's have a good look at what has been going on in the north.

Bill W3XO writes: "The DX fireworks continued crackling up to the time this is being written, 10 days before Christmas. In fact, some of the events transpiring during this period can probably be classified as bombshells. One example of such extreme pyrotechnics are the November 17 contacts by VE1YX and VE1ASJ with VU1AID in Bombay. This shocker took place about 1450Z with Bob and Andy's antennas aimed a few degrees east of north, which should be about the normal path to India. Three days later G5KW completed a crossband QSO with VS6BE over the long path. Ken first heard the Hong Kong station's signal at 1050Z and it remained audible for about an hour. On Monday, November 16, beginning about 1730Z, a number of the east coast gang not at work were treated to an opening to American Samoa with AH8A holding down the fort on that end. K1HTV/3, near Washington, was one of the fortunate ones on that occasion. All this took place as the 10.3 cm solar flux was declining from 196 on the 15th to a low 154 on the 24th.

"Despite the declining numbers, the period between November 8 and 20 will long be remembered by 6 metre DXers. It was during that time that C5AEH was activated by W6JKV and N6BFM. Using an IC-551D into an SB-200 modified for 6 metres and a 32 foot boom KLM, Jim and Bob completed some 1500 QSOs with approximately 900 different stations in 29 countries during their stay in The Gambia, West Africa. This includes a number of crossband contacts with a baker's dozen European countries not having the blessing of 6 metre operation. One of the high spots for them was November 15, when they completed WAC in a little over 6 hours. A contact with KG6DJX took care of Oceania. (Personally I think that is stretching things a bit to claim WAC on the basis of that contact, after all Australia is really the sixth continent whether you like it or not . . . 5LP.) VS6BE represented Asia and one of the few Europeans authorised 50 MHz operation SZ2DH, the special 6 metre

call for SV1DH, provided that continent. With FY7AZ for South America, EL2AV for Africa and, of course, numerous Ws and VEs to fill the blank for North America, the sweep was complete. Speaking of Ws, C5AEH made contacts with all States except KL7 and worked around a hundred 6s, some as early as 5.30 a.m. California time.

"As an illustration of the consistency of 50 MHz propagation to a number of parts of the world, at least during the time of their stay, many stations and areas were contacted every day while the operation was in progress. Prime examples of this are G5KW (crossband), the Caribbean with 9Y4LL, 8P6KX, DL3ZM/YV5 and the FY7-THF beacon all prominent, and the New England/Eastern Canada area with VE1YX worked every day. Daily contacts with Ecuadorian stations were completed and HC8VHF was worked many times. KG6DX and KG6JDX were worked on three successive days. Who would have thought 6 metres could display such results over these long haul paths? Let's hope this behaviour is taken into account when the powers that be in the various countries consider using this part of the spectrum for government or commercial communications or broadcast applications. The 6 metre gang owes a debt of gratitude to Jim and Bob for a fine job of organizing and operating. One aspect of their operation that was especially helpful was their near continuous use of 28.885. Jim is considering the Pacific for his next jaunt. I will keep you posted when definite information is available.

"EL2AV and EL2FY also continued to provide African contacts. One big day for this was November 22, when EL2FY worked Ws from 1 through 0 call areas. Incidentally, QSLs for Saitoh now go to JA1BGS. Another station putting that continent on the map is ZS3AK, who have been there many times to hand out South West African 6 metre QSOs, and thus somewhat relieving the load on ZS3E.

"November 29 brought a welcome sound for many of us who have been trying to work ZD8TC for over a year. Early that evening, about 2200Z, probably because of the link-up with Es and TE, Ted's weak and fluttery but readable signal poked its way through to the east coast. As a result, a number of us have a new country that many had given up expecting to get. Cards for ZD8TC go to N2CW.

"The first weekend in December brought much higher flux numbers, with the 10.3 cm reading reaching 270 by the 6th, and the pick-up in conditions was quite noticeable. The mornings saw much 6/10 metre activity to Europe with the appearance of HA6NN, CT2EE and HB0QQ/P in Liechenstein livening up the action. HB9QQ had made a special trip to a snowy mountain-top in that tiny principality just to provide North American 6 metre operators with a rare crossband country. The afternoon brought transcontinental openings with many signals well over S9. VE8BY was also doing a land office business. On the 8th one of those bombshells referred to earlier burst with a bang. VE1ASJ, who holds the title of North American 4 metre champion, did it again. This time Andy contacted five stations via the 6 to 4 metre crossband route, beginning around 1340Z. He worked EI6AS, EI6DT, G3APY, GW3MHW and G2AOK. All 70 MHz signals were quite weak, around 329 to 339. Congratulations are certainly in order to all who took part in these historic VHF contacts. As of this writing, we are still waiting for a US station to succeed in making a 6 to 4 contact. The afternoon of the same day brought KG6DX and KG6JDX into the east coast with a number of stations making the grade. The following afternoon KH6IAA was in, providing the last State for a few more 6 metre operators.

"The final weekend of this reporting period, December 12 and 13, also produced super conditions with many notable contacts being made. Saturday evening brought a strong JA opening to the west, with stations as far east as Albuquerque taking part. In addition to the many JAs available, W6UXN reports nabbing VS6BE, HL2JD and the Okinawa stations JR6RPW and KA6OR. The following day TF3T, the new call sign for TF3SG, experienced a many-hours opening to the US, working stations from coast to coast. When last heard Sveinn was attempting to work KL7. ZB2BL was also making it all the way to the west coast.

"As if to add an additional dash of spice to the feast provided by the F2 layer, Es made its usual winter return. For some of the newer 6 metre operators accustomed to the longer skip, it made for some unusual distances, and provided a few new "hard to get" States.

NEW COUNTRY

"Another country should be on 6 metres by the time this appears. J88AR St. Vincent in the Caribbean, is to get the Swan 250 and associated gear originally intended for HC8VHF. From that location it provides the opportunity of a new country for most of the 6 metre gang via both F2 and Es." Thanks, Bill for that lot, you lucky devil!

VK AND ZL ACTIVITY

And that means the Southern Hemisphere and 52 MHz. The month of January certainly saw many very strong Es openings throughout the country, including ZLs again. Lots of VK7s, a fair amount of VK6s and VK8 in Darwin from time to time. These plus the usual VK2 and VK4 contacts. VK3 mainly backscatter. David VK5KK noted in contact with Steve VK3OT on 9/1 at 00.08Z signals 5 x 2. Steve's beacon is audible even at the 5LP establishment most of the time, many times weak and fluttery, but there. 21/1: H44PT 5 x 9 at 0630Z to VK5KK, noted he was also getting into VK2, 3 and 4. Peter has apparently now worked 44 countries on 6 metres, which is a very good effort and again shows the advantages of having 50 MHz.

ON OTHER BANDS

While all the general activity appears to be going along on 6 metres, that's not really so! There are a few experienced operators who keep an ear on 2 metres when conditions are ripe, and are often rewarded for their efforts. Last month I reported the contacts from VK5 to VK2 on 144.100 SSB and via Es. Well, that's not all. On 4/1/82 Col VK5RO was heard by Brian ZL1AVZ at 0015Z on 144.100. At 0020Z VK5RO heard ZL1BJB on 144.100. None of the operators were able to make a two-way contact out of the conditions, but apparently they were there, as also later in the day at 1511Z when a ZL1 was heard on 2 metres. At the time of these hearings 6 metre signals were very strong between the two countries. Given another couple of years then the Es conditions will really start to shine on those sort of contacts.

On 9/1 another set of good conditions existed. Mick VK5ZDR had quite a ball working VK3s on 144.100 and then went shopping as the band started closing to VK3, but only to open a few minutes later to VK7, and Col VK5RO, again to the fore, worked VK7ZAH at 5 x 9 around 0015Z for about half an hour! Peter VK5ZPS also in on the deal. 5LP was also out shopping!

David VK5KK got all inspired, too, and fired up on 432 MHz on GMT day 9/1 and between 2115Z and 2235Z heard the beacon VK3RMB on 432.450, mainly weakly. He also worked VK3BKF at 5 x 5 on 144 and 5 x 1 on 432 around 2235Z. Also worked VK5DK at 2355Z.

It seems 16/1 would have to be a red letter day for the VK5 gang. Chris VK5MC of EME fame in the south-east of SA from 1100Z onwards worked on 432.100 SSB: VK5RA, VK5ZRO, VK5ZRG, VK5ZMJ, VK5KK, VK5LP, with signals over S9 in most cases. And it's quite a long haul from VK5MC to VK5ZRG, who is at Whyalla, and nearly as far to Jim VK5ZMJ, at Port Pirie.

Not content with 144 and 432 contacts, Chris then turned on the 1296 gear and was eventually able to work David VK5KK on that band after he took the spiders out of his gear, around 1345Z, with signals 5 x 9 both ways. Chris was using his 20 foot dish with 120 watts and David a 3 foot dish 8 feet high with 8 watts. Good going, chaps! Chris VK5MC believed also to have worked Les VK3ZBJ crossband 1296 and 432, plus another VK3 unknown.

That's not all for that weekend. Wally VK6KZ decided to go to a conference, etc., in Tasmania about that time, and what would you expect? He took some gear with him. So in the early evening of 16/1 he's on from Smithton up on the north-west point of Tasmania. A phone call gets 5LP and others on the band looking for him without success, although Wally has been hearing and working some VK3s, etc. The next morning is still 16/1 by Z time, so it's back to the band to see what is transpiring. In the meantime Colin VK5HI and others had been working Wally through the Adelaide channel 8 repeater. Mick VK5ZDR latched on to Wally on 144.100 SSB around

2220Z, followed by VK5LP at 2226Z with signals averaging 5 x 5 but some peaks to 5 x 7 which is pretty good considering the 10 watts and small antenna Wally was using. So the exercise was well worth the effort. Whilst there Wally checked for the VK7RTX beacon about 100 km away, and announced it to be on 144.900 + 800 Hz, so that's pretty close to what it ought to be!

The almost daily contacts on 432 MHz between VK5ZRO, VK5ZMJ, VK5ZRG, VK5KK, etc., using their pipeline are helping to keep the band alive. Despite the S9+ signals into Bob VK5ZRO, they still don't get to the 5LP establishment through the 60 dB hill for any workable contacts from Jim VK5ZMJ at Port Pirie and Don VK5ZRG at Whyalla, the path is just too difficult.

6 METRE CONTEST

You might like to have a go in this somewhat strange contest organised by the Kyoto 6 Metre Club, details of which were sent to me by Bob VK5ZRO.

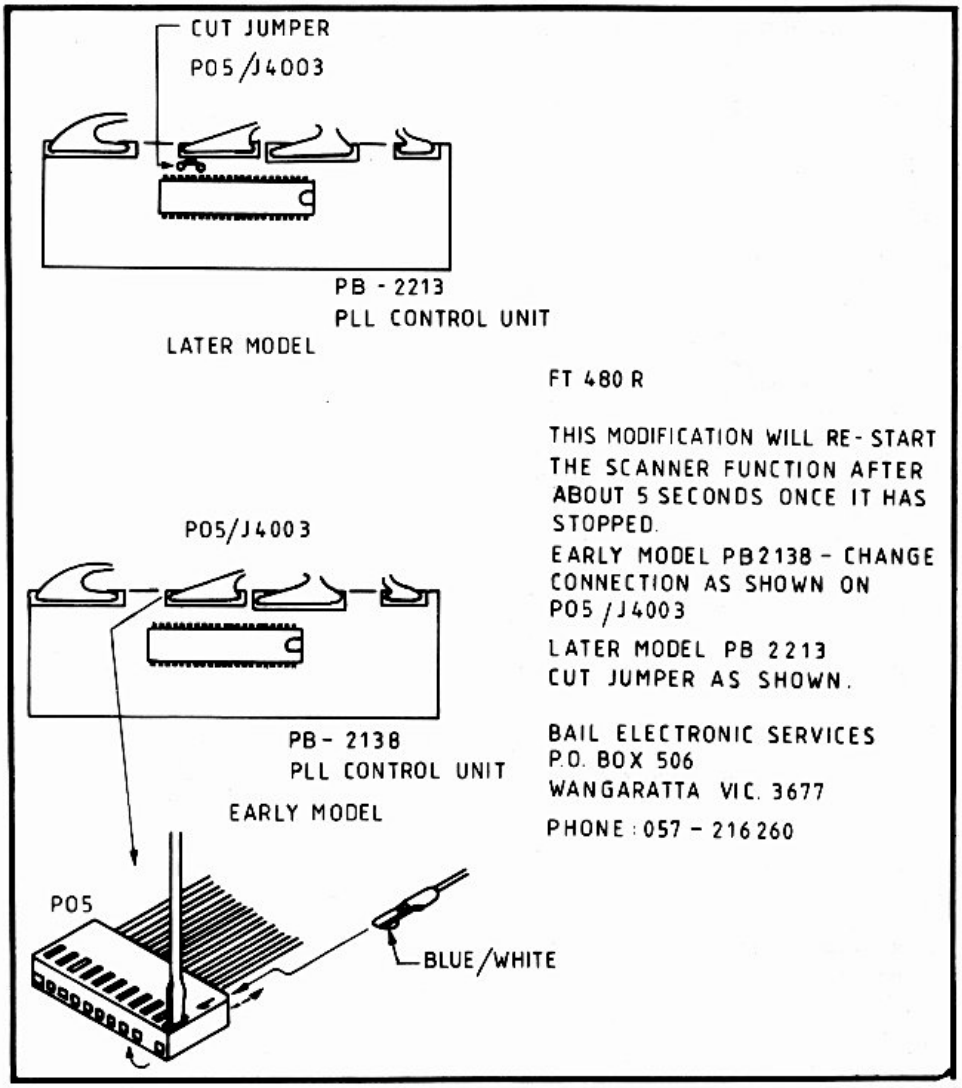
JA-VK 6 metre contest. (1) Eligibility: All 6 metre licensed amateurs of Japan and Australia. (2) Object: To cultivate mutual friendship and to raise the activities on 6m band. (3) Period: 0000Z 12/3/82 to 2400Z 21/3/82. (4) Frequency and mode: 52.0-52.5 MHz, CW, SSB and AM. (5) Exchange: Signal report and district, i.e., District JA . . . Prefecture; VK1-8 . . . Province and Territory; JD1, VK9 0, LH . . . Country. (6) Scoring: VK: (the number of QSOs with JA) x (their last letter, max. 26 for A-Z) x (call area, max. 10 for JA1-0). JA: (VKs) x (A-Z) x VK1-8, except 9 and 0). (7) Reporting: A: Log (free style) should indicate date and time in UTC, calls, complete exchange. B: Dupe sheets are required if more than 300 QSOs are made. C: An accompanying summary sheet must list the total number of QSOs and two kinds of multipliers. D: Entries must be postmarked no later than (no date given, but 3 weeks after end of period would seem reasonable . . . 5LP). Send to Kyoto 6m XX Club, C/- K. Kawamoto, 354-8 Kotokuji, Teramachi-Kuramaguchi, Kamigyo, Kyoto 602, Japan. (8) Award: The high scoring stations in each call area of JA and VK. (9) Results: Entries who desire all results enclose 2 IRC plus SAE. (10) Miscellaneous: An exclusive log sheet and summary sheet . . . 2 IRC plus SAE to above QTH." Well, how about that? Over to you!

There seems little else to say this month except that the equinox is almost upon us and on and off for the next three months perhaps we may be lucky enough to share in propagation improvements to allow us a final fling on 6 metres, with probably April and early May offering best opportunities from 2200 to 2400Z and 0700 to 0900Z. Good hunting!

Closing with the thought for the month: "Children need love, especially when they do not deserve it."

73. The Voice in the Hills. ■

AROUND THE TRADE



DECOUPLING RADIALS NOW AVAILABLE FOR 2 METRE RINGO

GFS Electronic Imports of Mitcham, Victoria, has just announced the availability of a set of DECOUPLING RADIALS to suit most types of 2 metre extended ringo antennas.

It has for some time now been widely publicised, particularly in US magazines, that an improvement in performance can be gained by introducing a set of decoupling radials below the ring matching section of gamma ring type verticals.

With this in mind GFS has made available a kit, the Model RK-2, consisting of four solid aluminium radials and a mounting ring which can be easily installed on an existing 2 metre ringo installation.

The RK-2 is suitable for use on masts up to 27 mm diameter, and is priced at $16 plus $3 post and packing. It is currently only available directly from GFS Electronic Imports, 15 McKeon Road, Mitcham, 3132, Victoria. Phone: (03) 873 3939, or Telex: 38053. ■

Quad versus Yagi

Two detailed articles in "Ham Radio" have raised again the long-standing controversy of quad versus yagi, and have cast considerable doubt on the validity of some of the pro-quad arguments that have held sway during the past decade.

In summary they provide convincing support for the view that a two-element quad can be roughly the equivalent of a three-element yagi (both in practice providing up to about 6 dB forward gain), but suggest there is little or no basis for the belief that three- and four-element quads are corresondingly superior to a yagi array, or that the quad form of structure automatically provides an additional 2 dB forward gain. Nor, it would seem, is it true, as so often stated, that quad arrays provide better low-height performance than yagi arrays. ■

What to do in 1982

(or what didn't you do in 1981)

Our hobby is currently faced with a number of threats to its continued existence in its current form. Some of these have been around for a while and some will always be with us. Examples would be WARC's new Acts and Regulations, new technology (e.g. cable TV), Government/DOC attitudes.

We, as WIA members, club members and as individual amateurs must consciously act to meet these threats so as to minimise their effect and to even turn them to our advantage. It is at this time of the year that we should start to plan our activities for the coming twelve months and beyond. Spend a few minutes reading this article and then looking critically at your activities.

There would appear to be six separate areas of endeavour that we should address. Let us look at them in turn.

1. REGULATORY

We should be trying to achieve a higher level of responsible self-regulation. How? Perhaps through self-discipline firstly and then through such combined activities as Amateur Advisory Committees and the Intruder Watch Service. We have all heard various abuses of our privileges — what are we going to do about it? Additional deregulation depends on how successfully we can demonstrate our capability to handle what we have already. Perhaps then we can hope to cope with extra responsibilities of third party and phone patch privileges.

2. TECHNICAL

The ITU definition of the Amateur Radio Service mentions "experimenters". Do we fit the bill? Despite assertions to the contrary, we all do in one way or another. Many, for example, build antennae, monitor propagation, build test equipment, cure EMC problems, etc. Perhaps we can do more — why not look at VHF/UHF techniques, different modes, Project ASERT or other such activities. Think about it, then ACT.

3. EDUCATIONAL

It is essential that we firstly establish and maintain an adequate entrance level to our hobby. This done we assist people to reach this level and then progress past into other areas (compare with "post-trade" courses). Whilst technical education is essential, we should not forget "social" education, i.e. how to behave on the air, how to QSL, etc.

4. INTERNATIONAL

The WIA nationally looks after our interests by being involved with WARC, ITU, IARU, etc., so how can you help? By making friendly contacts with overseas amateurs you expose them to our lifestyle and personalities. Don't you be the one to let the side down.

5. PUBLIC SERVICE

We should always be ready to use our resources and training to assist the community in time of need. We need to "be prepared". How? Through WICEN groups and perhaps making use of third party privileges to taste. We must strive to improve public awareness of our hobby — not to gain members but to increase their understanding and perhaps tolerance (e.g. TVI, tower problems).

6. MEMBER SERVICE

On the surface this is the responsibility of the WIA and clubs. On reflection, however, it is obvious that the individual must contribute as well as receiving service. How do you support your club — actively or passively? **You will never get any more out of the WIA or your club than you put into it.** Are you ready to start giving? As well as providing State, National and International representation, the WIA offers Bookshop and QSL services, information channels (news, nets, AR), a technical forum (AR), as well as many social activities (awards, contests, conventions, etc.).

CONCLUSIONS

The WIA, clubs and individual amateurs (you and me) must strive to be active in these areas. It is not sufficient to merely play lip service or to over-emphasize one area to the detriment of others. Our approach must be balanced and considered. In this way we can effectively meet the threats facing our hobby over the next decade or so.

It is squarely on us as individuals, club and Institute members — "How do you measure up?" and perhaps more importantly **"What are you going to do about it?".**—From "QTC", VK4 Division AR insert, January 1982. ■

☆☆★☆☆

If your time hasn't come, even a fall off your 60 foot tower on to a 50,000 volt line won't kill you.

☆☆★☆☆

Heard on 20 metres: "Gasoline and alcohol do not mix, but try drinking them straight."

☆☆★☆☆

Most of us don't believe everything we hear, but we usually repeat it anyway.

QSP

BY-LINE IN QST NOVEMBER 1981

"The most serious problem confronting amateur radio in the United States is the proliferation of righly restrictive zoning ordinances." ■

BEACONS ON NEW BANDS — USA

The FCC has authorised an experimental radio beacon on the new bands to be allocated in due course resulting from WARC 79. An important reason is to secure on propagation use various situations, including natural disasters. The 10 MHz beacon would commence on 1st October, 1981, under the call sign KK2XJM. The licensee for the experiment is W4MB. Reports are required.—QST, November 1981. ■

WICEN

R. G. Henderson VK1RH
Federal WICEN Co-ordinator

WICEN COMMUNICATIONS HANDBOOK

Copies of the proposed WICEN Communications Handbook were despatched to State WICEN Co-ordinators together with a newsletter last December. If you wish to see the Handbook contact your Co-ordinator.

WICEN EXERCISES

A few thoughts on WICEN exercises. Firstly who should we exercise in conjunction with or support of? Refer to your Handbook for the precise answer but bear in mind that we should not be providing communications that could be provided by a commercial agency, including Telecom.

Secondly how do we select community aid exercises to support? Well the situation must have training value for the WICEN communicator, that is, involve him in a task not unlike an emergency situation he could be called to respond to. It must be within the local group's capabilities and desirably should demonstrate WICEN to local disaster control authorities. A short INFORMATION leaflet explaining WICEN and amateur radio, but carefully written so as to NOT appear as a PUBLICITY aid, can be useful.

Thirdly do we repeat community aid exercises year after year? This is a delicate question as you can get locked in to support a service group and drift away from the exercise aim. Consequently each exercise should be debriefed fully to measure its true worth; perhaps next year it could be done with a few CB hand-helds. Again there are situations where little exercise traffic is generated and the WICEN operator feels he is wasting his time and effort.

On the other extreme exercises may be very useful to both parties and lead to stronger ties and increased support, such as donations of equipment to WICEN groups.

Fourthly put a considerable effort into planning your exercises, good liaison early with the supported community group pays dividends. Plan your involvement and identify what support your communicators can expect. As a guide they should be treated no worse than the organization's helpers, free entrance tickets, lunch facilities, car parking, use of club rooms, etc., should all be investigated. Seen in a hard mercenary light you are providing free what could be a quite costly service if it were hired commercially, if it were available!

Finally, when executing the exercise ensure all WICEN members know their duties and limit of responsibilities. ■

CONTESTS

Reg Dwyer VK1BR
PO Box 236, Jamison 2614

CONTEST CALENDAR

March

6/7	ARRL DX PHONE
3/14	QCWA PHONE QSO PARTY
20/21	BERMUDA CONTEST
20/21	BARTG RTTY CONTEST
27/28	CQWW WPX SSB

April

3/4	POLISH CW
17/18	POLISH PHONE
24/25	HELVETIA

May

29/30 CQ WW WPX CW

RESULTS

Results of the 1981 Helvetia Contest have been received. VK4LX and ZL1AJU both received certificates for their entries. Congratulations.

CQ 160 METRE CW CONTEST 1981

A short note from CQ Contest organisers mentioned that there were no entries from VK or ZL for the 160 metre CW Contest.

NP4A was world winner with 439200. GD4BEG was European winner with 180117. W8LRL was the USA winner with 164912.

WE GOOFED

This time Lindsay VK5NLC (Now VK5GZ) contacted me to find out what happened to his 140 points for his CW log in the RD Contest. After some checking, the log was found. My apologies, Lindsay, and congratulations on the full call.

1982 REMEMBRANCE DAY CONTEST

A rule and formula revision for the 1982 contest is well under way at the time of writing. The formula will be decided and then sent to the Federal body for their review and comment, all in time for publishing with the rules, hopefully in the July edition of AR magazine.

CONTEST CHAMPION TROPHY 1980

Results of the 1980 Contest Champion Trophy. The contests that were chosen to be assessed for competition. Points were:

John Moyle, VK/ZL, RD, AUST. NOVICE

Points by the Contest Results, 1980

Pos	VK	JM	RD	Nov	VK/ZL	Total
1	3XB	10	0	8	7+6	31
2	3AEW	8	8	—	9	25
3	4LT	7	7	—	10	24

No other stations qualified.
The — signifies not entered.

Contest Champion Trophy Results for 1981 Progressive

The same contests for 1981 were chosen as were used in the 1980 Contest Champion Trophy scores to avoid any confusion.

VK	JM	RD	Nov.	VK/ZL	Total
2BQS	4	0	8		12
2DCL	9	10	—		19
3XB	—	0	9+10		19
5QX	9	10	—		19
3CGR	10	8	—		18
2EL	10	8	—		18
3AEW	8	10	—		18
3ADW	7	7	—		14
5SR	5	—	8		13
3BRL	10	0	—		10
2JM	10	0	—		10

Only VK2BQS has qualified at this stage by entering three of the four contests.

As the results of the VK/ZL Contest are not yet available it is impossible to say who will become the top scorer for 1981. Good luck to all of you. ■

INTRUDER WATCH

Bob McKernan VK4LG
Federal IW Co-ordinator

All intruder observers are reminded that there is still an urgent requirement for reports of harmful interference from UMS on 21032 kHz and CQ5 on 21115 kHz. Intruder Watch is still waiting for an overdue reaction from our communications authorities on a formal complaint about these harmful intruders. In the meantime we must continue to strengthen our case against them by presentation of ACTUAL WRITTEN COMPLAINTS FROM AMATEUR OPERATORS. If you are an experienced amateur, not active in administrative aspects of our hobby, here is your big chance to help. Reports on these two intruders will be most welcome. I take this opportunity to thank those limited number of amateurs who are currently reporting these intruders.

The Intruder Watch requires co-operation from the general amateur population. To effectively survive, it also requires guidance and assistance from IARU Monitoring Service HQ in the UK. Not one is really pulling their weight. If the slow deterioration of the quality of our hobby is your aim, do not act now or ever. If you enjoy the facilities gained over many years with much effort and expense, ACT NOW. If you are a member of the general amateur population, you should report intruders monthly to your Division IW Co-ordinator. If you are a Division Council member, ensure that your Division continues to have an active IWC, and support him in his job, so that the Federal IW Co-ordinator can be effective. If you are a member of IARUMS HQ and read a copy of this column, recall that the IW services of this column, recall that the IW services of this world will die without feedback and direction from HQ.

All amateurs should remember that THE OTHER FELLOW WILL NOT DO IT . . . YOU HAVE TO. ■

FORWARD BIAS

(VK1 DIVISION)

CLASSES — 1982

NAOCP and AOCP/LAOCP classes will be conducted again this year by the VK1 Division.

The classes will consist of a full year course — 16th February to 9th November — for the NAOCP and a course covering the period 4th March to 12th August for the AOCP.

A "crash course" for the May NAOCP will NOT be conducted this year.

All classes will be held in the middle of the three small rooms upstairs at the Bunda Street end of the Griffen Centre in Civic. This location should be much more convenient for those prospective "hams" who live on the south side.

The NAOCP classes will be held on Tuesday evenings from 6.30 p.m. to 9.00 p.m. and the AOCP classes on Thursday evenings from 6.30 p.m. to 9.00 p.m. Format will be a half hour CW session followed by two hours of theory.

The course instructor for the NAOCP course will be Robin Greeney VK1ZRG and Owen VK1CC will continue as course instructor for the AOCP again this year.

At the time of writing these notes the course fees had not been decided but, as in past years, are expected to be very reasonable.

Enquiries should be directed to Robin on 31 8638 (AH) or to Owen on 47 4268 (AH).

CONGRATULATIONS CHARLENE — VK1NEJ

Our congratulations go to Charlene, the 12-year-old daughter of Federal Contest Manager Reg Dwyer VK1BR, who has recently been licensed as VK1NEJ.

"Charley" sat for the November 1981 novice exam after about 12 months study with Dad and Ted VK1TR.

A keen CWer, Charlene operates mainly on 15 and 10 metres. She also has assisted Dad in converting a CB rig to 10 metres for her own use.

In 1st Form at High School, Charlene also finds time to cover a number of other activities, including swimming and showing several champion dogs.

And, if that is not enough she is also learning Japanese phrases to assist with her JA contacts, and continuing with her studies with a view to sitting for the AOCP some time in 1983.

Well done, "Charley", we in VK1 are proud to claim what must be a new record — the youngest licensed YL in Australia. We're sure that there will be many amateurs in Australia and indeed throughout the world who will be very pleased to work your station and claim your QSL card.

73. VK1KV. ■

VK4 WIA NOTES

We are now entering what is perhaps the busiest time of the year for the Division. Firstly, we have a new Council and new office-bearers in a number of areas. Secondly, preparations for the Radio Club Workshop have moved into top gear. Thirdly, our delegates are being briefed for the upcoming Federal Convention.

Perhaps a few words are in order regarding the abovementioned Workshop.

The first Radio Club Workshop was held in 1975 and was hosted by the Ipswich and District Radio Club. Attendance was limited to clubs that felt that they were within driving distance. Since then, the Workshop has gone from strength to strength. Delegates now come from over 90 per cent of the affiliated clubs throughout the entire State — from Cairns and Mt. Isa to Dalby and the Gold Coast.

Discussion centres on the motions submitted by clubs and circulated prior to the weekend and then expands to cover Divisional services and, of course, Federal Convention motions as available.

What does the Workshop achieve? Most importantly it provides a direct avenue for members from all over the State to participate in forming the policies and directions to be taken by the Division. In this way Council can keep abreast of members thinking on many matters. It also provides an excellent preparation for our delegates to the Federal Convention (usually held two weeks after the Workshop). It is felt that in this way the Division can more adequately represent its members.

The Workshop also provides a way of "humanizing" liaison between Council and members throughout the State, i.e., putting faces to voices and to letter-writers. This, in conjunction with the weekly Radio Club Liaison Net on 80m, has borne fruit many times.

This year sees a few major changes to the Workshop. For the first time the Workshop will be "live in" at the Griffith University, enabling less time to be wasted in travel to billets and hence more time in deliberating and discussing. Whilst a number of motions have been received from various clubs, it is proposed that a major effort will be mounted this year to produce a series of broader policy statements on selected topics. This will require a lot of effort from delegates as a lot of ground is expected to be covered in a relatively short time.

YOU CAN HELP

If you are a delegate — make sure that you discuss the circulated motions with your club members and make sure that you have the broadest backgrounding in their attitudes in general. If you are not a delegate — make sure that your delegate is well acquainted with your club's attitudes and is not going to just present his or her views only. It is in this way only that we can meet the objectives set for the weekend.

REPEATER CHANGE

The Darling Downs repeater on the Bunya Mountains has changed frequency to 146.15 MHz input and 146.75 MHz output and now shares a common building with the VK4RTT beacon. ■

THE WA BULLETIN

NOTICE OF AGM

Notice is hereby given that the AGM of the West Australian Division of the WIA will be held on Tuesday, 20th April, 1982, at Science House, 712 Murray Street, West Perth, on the conclusion of the April general meeting. Business to be transacted will be:—

1. Consideration of Council's annual report and balance sheet.
2. Election of office-bearers, viz.:—
   (a) President.
   (b) Vice-President.
   (c) Seven other Councillors.
3. Election of two auditors.
4. Appointment of a Patron.
5. General business which has been duly notified.

Agena items will be advised on the Divisional news broadcast on the three Sundays prior to the AGM.

Members unable to attend may appoint another member as their proxy in writing in the following form:—

I ..... member of the Institute, hereby appoint Mr..... also a member of the Institute, to act for me as my proxy and in my name to do all things which I myself being present could do at the meeting of the Institute to be held at Science House, West Perth, on the 20th April, 1982.

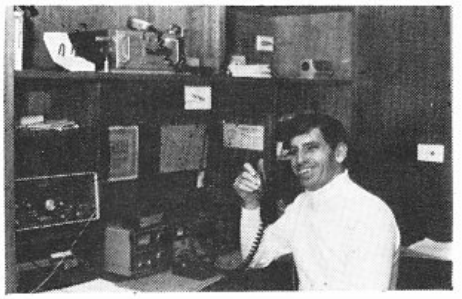
Signature..... Witness .....

Date .....

■

SPOTLIGHT ON SWLing

Robin Harwood VK7RH
5 Helen St., Launceston, Tasmania 7250



Well, the M-82 broadcast period had commenced. This will last until the first Sunday in May. By now, you have probably noticed that many stations have altered their frequencies to take account of the changing propagation. Also, you have made a Chart of Occupancy of your favourite Bands. Just before you settle down, don't forget that Europe goes on Daylight Saving Time as from the last Sunday of this month, and, as a consequence, programmes for European audiences will be advanced 1 hour. Not only that, but Soviet broadcasting outlets, including Radio Moscow, make their half-yearly alterations to their frequency lists on April the 1st. So it will be a hectic time, catching up with the changes.

Radio Australia's Communications programme — Spectrum, which has been monthly up till now, will now be aired fortnightly as from March. You can hear it on March 7th, and 21st, at either 0610, 0810, 1612, 2112, or 0330 Mondays. It is hosted by Dick Speekman.

UTC

Talking of time:—as from January the first, Greenwich Mean Time (GMT) ceased to the universal Standard Time, and co-ordinated Universal Time (UTC) came into effect. Really there is no difference between UTC and GMT, just a question of semantics.

PROPAGATION

I have been really surprised how quickly the higher frequencies are markedly deteriorating, as far as propagation goes. Both 15 and 10 metres have not produced any startling activity. It is down to what it was twelve months ago. As sunspots decrease, the lower frequencies do seemingly improve. At the bottom of the last cycle, propagation on 3.5 and 7 MHz was excellent, and I well remember Don G3AOO, from near Manchester, did put in a very strong, readable signal on forty in the late afternoons. Yet, I really have not heard any comparable European signal on 7 MHz for many years.

THIRTY METRES

Early in January, I was fortunate in being able to try out the new thirty metre allocation (10.1 to 10.15 MHz), along with many other stations. It was possible to work all States as well as NZ, the Pacific, Europe and a few scattered Asian countries. It is not as crowded as twenty, as far as amateur stations are concerned. However, there are a myriad of commercial fixed services, who have priority anyway. It is significant that the Ws and JAs have not yet received this allocation, because the Fixed Services in these regions have protested to their respective regulatory authorities about sharing their frequencies with amateurs, so that no activity exists from amateurs in Japan and the Americas so far.

It was also interesting to note that the majority of Australian stations were initially using phone, but since the novelty has worn off, only diehard "brasspounders" seem to make use of any spare space available on thirty metres.

RADIO POLONIA

Those interested in attempting to hear Radio Polonia in Warsaw, could try 15120 kHz at about 1020 UTC. I think it is Warsaw, but it is hemmed in between Radio Australia on 15115 and Radio Peking, broadcasting in Khmer, on 15125 kHz. It is reported to be broadcasting continuously a 1 hour loop in Polish, English and other European languages between 1200 and 2300 UTC. As the situation fluctuates in that region, expect its programmes to do likewise.

250 KW x 11

Incidentally, Radio Free Europe/Radio Liberty has installed 11 new 250 kW transmitters at their two sites in Portugal and West Germany. Now it should be possible to hear their output through the constant jamming, yet it is also probable the power of the jammers will also increase accordingly and spill over to adjacent channels even more.

TOP SECRET

There has been talk recently in the States of an anti-Castro "clandestine" station called Radio Marti being set up in Florida. It will be reportedly mainly MW but could easily spill over to shortwave as well. Another Latin American that could conceivably be involved in a radio war is El Salvador. At present, only one frequency is operational on HF, but there have been indications that this could be increased very rapidly to counter a number of low powered clandestine stations of the guerillas, which have been reported in California operating between 8.1 and 8.2 MHz and heard very weakly signing off at 0500 UTC.

Well, that is all for this month. Good DXing and 73. ■

LISTENING AROUND

With Joe VK2BXJ, Buronga, NSW

Between the 13th and 17th of December I was in Melbourne as the house guest of Don VK3VPW and his good lady at Narre Warren. They gave me the real VIP treatment.

First day with Don was occupied by a visit to Radio Lyndhurst, which will be a story all by itself, and the next day, together with two other amateurs whom I was meeting for the first time, we were at Tullamarine to see Des VK3BSE (of Cocktail Net time) and his lady off on their Tasmanian jaunt. The last day was my free day in Melbourne and then I had to return to this hot place.

But while at Don's place I took the opportunity via Don's rig to have a word with Rob VS6HH in Hong Kong and David N2ATY of Fairport, New York, both on 28 MHz. So now I have very attractive cards from both. Rob told me about the water rationing in Hong Kong, and David says that many US amateurs know my EICO 753 and the VFO problems that are characteristic of that vintage rig.

Back here at Buronga, at 3.35 a.m. local time, Christmas morning, in a night owl's net on 80, we had a breaker who turned out to be Chris VK2PLX (home QTH Tumut), then at the scene of a car roll-over, 22 km south of Yass. Of those listening Sam VK5TZ could hear him best, and Chris's request for police and ambulance to attend the scene was relayed by Sam on the blower to Adelaide police, while we stood by to get confirmation from Chris re arrival of the assistance needed. At 4.07 a.m. Chris told us that help had arrived and said that Yass police praised the initiative of the amateur operators in getting the message through. Chris, who was conserving a rapidly running down battery by not talking unnecessarily, later told us that he's only had his licence a week and this was the first time that he had gone mobile. Among others who stood by while the incident was being handled was Jack ZL1LK at Orewa (Auckland), New Zealand, and Bart VK6NPM, of Perth, himself a seasoned handler of emergency calls as a Crest monitor on 27 MHz. ZL1LK said that he could hear Chris quite clearly

Howard Boddy ZL4GG, of 14 Falcon Street, Kaikorai, Dunedin, New Zealand, is an 84-year-old gentleman who is very interested in Australia. He told me that he has no less than 36 books on the subject of our island continent. Howard uses a 101E and on the back of his card, which bears a sketch of a New Zealand bird called the Kia, he writes: "I do not operate regularly in the early hours of the morning but my wife Emily and I have a cup of tea in the early hours. I am 84 years and my wife is 80 years. Her parents migrated originally from Scotland to Gisborne, east of Ballarat, Victoria, and there is a McGeorge Road named after them in that town. My mother's people came from Scotland in a sailing ship, the "Lady Egidia". My father came from London in 1887. I am a retired chartered accountant and my main sporting interest has been hiking in the mountains. My best climb was Mount Asprey, third ascent in 1928." Oh well, Howard, it was lovely to hear from you and I have printed your address in the hope that some Aussies will send you plenty more books and newspapers on Australia.

There's a very energetic chap called Sam Voron VK2BVS up Sydney way, and Sam's well known for his PR work with amateur radio and his handling of third party traffic, particularly when there's any industrial tie-up that dislocates ordinary communications. One New Year's Eve Sam had installed himself with some helpers and his equipment in Sydney's Hyde Park, there to give a demo, on the occasion of **the Festival of Sydney,** of how amateur radio and particularly third party message handling works. Just before midnight I spoke to Sam and those listening with him, and he told me that as soon as the clock struck the witching hour heralding in the New Year, he was all set to be one of the first to use the new 10 MHz band. My shortwave receiver isn't much chop on 30 metres, so sorry I couldn't hear you, Sam, but wasn't it 30 metres that the old-timers used to use before the commercials set their sights on that band?

My Kraco CB was some time ago converted for ten metres, and on 21/12/81 at approximately 11.14 a.m. local time (28.565 MHz), KZBTB by the handle of Jim was heard using **one watt** to speak to other US stations from **somewhere within the Grand Canyon.** Now how's that, as the cricketers would say?

Alan Chung from Cooma, NSW, is one of the many SWLs who listen to a collection of us night owls on 80 in the wee small hours. And some of the SWLs, including Alan, sometimes give me a ring on the blower too, just to let me know that they are really there reading the mail ("sandbagging" as it's called). At the end of quite a long phone call the other morning Alan excused himself saying that he had some plumbing to do. Asked what was the nature of the plumbing, he said that he had to connect up 480 cow teats to the milking machine at the dairy where he works!

One night on 80 metres the subject of vintage broadcast receivers came up, and I put in my pennyworth. One of the earliest that we had at our house in Sydney was a Gulbransen dual wave console, on which it was my delight as a schoolboy to listen to the bells of St. Peter's booming out in all their glory over Vatican Radio. On that set also I heard the abdication speech of King Edward VIII, and occasionally the rantings in German of a ratbag called Hitler. We couldn't understand what he was on about, but we sure could hear him stirring the pot. I used to listen to 20 metres also and my favourite US amateur was W6ITH, in Wittier, California.

I don't think I ever plucked up enough courage to send W6ITH a signal report so I must assume that he never knew of my existence, but I used to think it wonderful to hear him nattering on about "doublets" at a time when I don't think I would have known a "doublet" from a cat's whisker. I wonder what W6ITH would think of the amateur scene and the little black boxes if he's still around today?

One of my favourite "party" tricks with the Gulbransen when visitors were around was to let them hear "Molly", our fresian cow, bellowing its head off through the Gulbransen in the dining room as it was being milked in the cow shed down the back yard. Secret of this enterprise was a large question mark shaped horn loud speaker roped in for service as a most excellent microphone in the shed, and connected to the pick-up terminals of the Gulbransen. Boy, could that cow roar in our dining room, and weren't those visitors impressed at the "boy genius" who made it all possible! Ah the innocence of youth, but wasn't it great fun!

Well, my space is nearly taken up now. Sorry I've missed out a couple of issues, but I hope you all had a merry Christmas and a happy New Year, and thanks to you all for your kind comments on the air about this column.

73. Joe VK2BJX. ■

ALARA

AUSTRALIAN LADIES' AMATEUR RADIO ASSOCIATION

My thanks to all who enclosed comments in their contest logs; full details in April AR. Remember 13th November, 1982, for contest No. 2.

Congratulations to Gill VK6YL, "Co-Amateur for the Year", awarded by VK6 Division of WIA. Gill is secretary of the WA repeater group and shared the honour with Trevor VK6MS, the President. The award is a perpetual shield, each received a framed certificate and microphone. Well done, Gill, another first for a YL. Gill is QSL Manager for VK9ZH on Willis Island, so please QSL direct to Gill or via VK6 Bureau.

NEW MEMBERS

VK4VKT Valerie, VK3NLO Joan, VK4NAM Dorothy, VK2PLG Sue; also DX members Mary Ann WA3HUP, Paula DJ0EK, Margot DK5TT, Cilla G4KVR, Celia ZL1ALK, and Jocelyn "Jos" ZL2BAO.

NEW CALL SIGNS

Joyanne VK5BJH (was VK5PJH), Joan VK7ZYL, Dorothy VK4NAM, Sue VK6NSU, Beryl VK2DVI (was VK2VDS), Sue VK2PLG, Erica VK3PBU, Beth VK6EL and Sue VK5AYL.

Congratulations to all of you and to any other YLs who have new calls.

Remember, subscriptions were due on 1/1/82 and Valda would like to hear from you. With postage costs rising all the time we can only send Newsletters out to financial members, so if you haven't already paid please do it NOW. VK rates are $5 yearly. Overseas airmail $5 (not $6 as previously stated), sea mail $3. Ms. Valda Trenberth VK3DVT, Treasurer, C/-Brighton PO, Church Street, Brighton 3186.

Marlene VK5QO has issued two copies of the Newsletter since she took over as editor; very interesting and informative, Marlene, well done. Investigations are being made to have stationery with ALARA's logo printed on it and also stickers for use on airmail envelopes to help promote ALARA. BYLARA (British) and CLARA (Canadian) have this and it is effective.

ALARA has badges and charms for sale among members and these are exchanged with overseas sponsored YLs. Also available if your YL is a collector of teaspoons, are spoons for $2.80 each, perhaps something different for a birthday!

Girls, if you have any photos of groups taken at a field day or convention can I have a copy for publication. The photo in January AR was very well received judging by comments I had. It is much nicer to know what you look like.

Until next month 33/73/88 to all — VK3DML. ■

The tip you leave today would have bought a meal a few years ago.

INTERNATIONAL NEWS

NEW BANDS

According to the latest information amateurs have been authorised the use of one or more of the new bands from 1/1/1982 arising out of the IARU work for WARC 79:—

Switzerland —
10100-10150 kHz secondary.
18068-18168 kHz.
24.890-24990 kHz.
Bands above 25 GHz, as specified.

A STEP IN THE RIGHT DIRECTION

An item in the IARU R1 news December 1981 announced that licensed Luxembourg amateurs could operate temporarily in West Germany for portables and mobiles using their own licences. The writer commented: "We should thank both P. and T. Ministries on this first step towards European integration in amateur radio".

VHSC

The Very High Speed Club, founded 1/5/1961, exists to promote very high speed telegraphy. The minimum speed is 200 letters per minute, no keyboards or decoders, during 30 minutes QSO with four different Club members. On the list of members are VK3CX, VK4FJ and VK4YP. Sponsor is VERON with PA0DIN as Secretary.

VS6 ACTIVITY DAY

The Hong Kong Amateur Radio Transmitting Society announces 3rd and 4th April as activity days to allow amateurs worldwide to work Hong Kong.

RECIPROCITY AND GUEST LICENSING

South Africa has announced that guest licences will be available for visiting amateurs even where no reciprocal agreement is in force. Applications must be made three months in advance, together with complete itinerary of the visit. Not available to Novices, validity three months, and each will be considered on merit. Licence fee R10. Apply to PMG (Telecommunications Department), Private Bag X74, 0001 Pretoria. QST November 1981. A reciprocal operating agreement between USA and Italy came into force 28/8/1981.

ODDMENTS

DOC Canada has permitted 10m repeaters, and announced a new third party agreement with Haiti and a new reciprocal operation agreement with Australia. Operations by XZ5A and XZ9A are not counted under ARRL DXCC rules as the Burmese Government does not recognise the insurgent government in the area concerned. QST November 1981. ■

WARNING!!

Disposing of your old rig??

Please ensure it goes ONLY to someone licensed to use it on YOUR bands.

EDUCATION NOTES

Thank you to all those who have written to me with comments or ideas on education matters. Your interest is appreciated, and several suggestions have been noted, even if I am a bit slow in answering your letters.

I would now like to start collecting information about classes being run this year, either by individuals, clubs or educational institutions. I see that a number of TAFE colleges are now offering radio courses. I would like to hear the opinions of those who have undertaken various courses. Comments on the background expected, the parts where most difficulty was experienced, the references used, or the overall efficiency of the course would be most welcome.

One problem in many classes is the wide range of backgrounds, abilities and dedication among the students. How can instructors minimise this?

Now for the commercial.

I have at present one tape released by DOC comprising five Morse exams at five words per minute and five exams at 10 words per minute. If you send me a C60 tape I can make you a copy, but please say if you do not want both speeds, in which case I could fill the blank half with plain language or random letters at the same speed.

I hope soon to have a second tape, which would allow for a full 60 minutes at either speed — what more could anyone want?

I hope to have another novice trial paper ready early next month. The November novice and February AOCP theory and regulations trial papers are available from the Executive office on request. The questions on these papers have not been taken from official exams, but the papers have been approved by DOC as of acceptable standard (or perhaps just a bit harder than theirs). The main idea is to provide class instructors with a "neutral" final test paper, but they are available to students working on their own as well. Please feel free to comment on them if you have used them.

I am trying to establish an education net on Wednesday evenings, about 2200 local time, at about 3685 kHz. All are welcome to join in.

Brenda VK3KT. ■

Bumper Sticker of the week: "The Rat Race is over . . . The rats have won."

Photographs for AR

DON'T KEEP THEM TO YOURSELF

Send them in – NOW

LETTERS TO THE EDITOR

Any opinion expressed under this heading is the individual opinion of the writer and does not necessarily coincide with that of the publisher.

85 Wyndham Street, Roma, Qld. 4455
15th November, 1981

The Editor,
Dear Sir,

I'm answering a letter in the November edition of AR as regards to the problems on the 15 metre band with operators coming down into the CW section of the band from VK1CNX.

I must agree that this is a serious problem. Only tonight I was having a CW QSO with an overseas country on 21136 when a novice station started transmitting on Phone on 21135 and then asked me to QSY because I was interfering with his transmissions.

I won't mention any call signs but this particular person is often down in this section. I like working CW on 15 metres but when this station starts transmitting he splatters down to 21125, thus making CW operation impossible. I think that this is the only band where this problem arises.

I'm hoping that the person responsible reads this article and takes the hint and moves a little higher up the band. I thank that VK1NCX and I are complaining about the same person.

73 to all.

Yours sincerely,

Kevin Crandell VK4VKX. ■

The Editor,
Dear Sir,

As one of the older members of the WIA and being interested in the historical side of amateur radio, I thought that your readers might be interested also in some press cuttings that I acquired early this year from the Latrobe Library. They refer to "WICEN Type" exercises held on the Yarra 60 years ago during Henley on the Yarra boat races.

The "Argus" newspaper cuttings ar self explanatory but some of the older readers may be interested in the names of those who took part in the year 1922. Four stations were set up along the river bank. No. 1 in a tent at the start manned and operated by Ross Hull and Charlie Hiam, No. 2 in a tent operated by Max Howden and Godfrey Barthold, No. 3 in a tent operated by Ron Hipwell and Len Webb, and the last in the Mercantile Boat Shed and operated by Keith Ballantyne and Ron Ridoutt. At the boat shed we used the flagpole on the roof for our antenna wire. I remember that the pole had no halyard so in the enthusiasm of youth I shinned up the pole and threaded a rope through the pulley while hanging on grimly with one hand.

Of those that took part, as far as I know, only three are still alive — Godfrey Barthold VK3BT, Len Webb, and myself VK3AKB.

73. VK3AKB. ■

DXCC

A correspondent wishing to remain anonymous (name known) writes about the DXCC system from the viewpoint of being in or close to the Honour Roll. We believe the ARRL DXCC rules and criteria should be followed for the WIA DXCC Award because of the international nature of earning such an award.—(Ed.)

The Editor,
Dear Sir,

With reference to the article regarding the DXCC in Amateur Radio December 1981 and January 1982 and the invitation to submit any comments. My thoughts and a lot of other serious DXers cannot concur with the Award Manager's inconsistency in his determination of who will be "good" for a new country.

At this juncture, I would like to point out that this criticism is in no way a personal attack on VK5WV and that I have nothing personally to gain from the following remarks as my DXCC is with the ARRL (since 1977 and just updated to a credit in excess of 300). This is because I feel ARRL is a "yard stick" which is common to all participants and has world wide recognition. This is very important if one's friends are mainly from overseas countries and quoting that one has "X" number of countries to their credit creates friendly competition.

Here are some examples where I find it hard to understand some of the AM's decisions.

(1) VE Sable Island. This expedition was doomed from the start and the ARRL did not allow any credits, so was there a lack of communication for it to be allowed in VK and later deleted from one's total?

(2) 9U5 Burundi. The ARRL does not allow 9U5JM due to the terms of its licence which restrict experiments to within its own country. However, Dr. Ed Richmond on an African tour was a guest operator there and worked the world. Ed has avoided the question of the promised paper work which he was going to take back to Newington and sort problems out, both on air and in direct correspondence. The AM does not know of any impediment why it should not be allowed. Why?

(3) 5A Libya. G3JKI was he portable 5A? Repeated requests by ARRL for information, from both the operator and the QSL Manager, have fallen on very deaf ears. Both stations being hyperactive before the operation but seldom if ever heard since. (The QSLs took 12 months to appear.)

(4) XZ Burma. JA8BMK gained permission to operate from within a rebel State and the "Licence" was signed by the Military leader. The authority as published in an American DX news sheet authorised JA8BMK to operate. When he left, the same call sign was being used and magically another appeared out of the hat. Some questions come to mind such as (a) Was the licence extended? (b) Who conducted the examination of the two operators who are now using XZ5A and XZ9A? (c) Would any amateur be breaching privileges by working a "Pirate"? (d) If our External Affairs Department recognise the Administration in Rangoon, Rangoon does not and will not recognise Kawthoolei, why will the WIA go out on a limb? (e) Would the AM consider "Prince Leonard's Hutt River Province" or the "Rainbow Creek" brigade for they seem to have similar parameters? Whatever happens this escapade would have to be among the "Top Five" as a money spinner (for whom it is not clear) even to the extent of Tee shirts at $10 each adorning many North American wardrobes.

I feel that a point has been made with the above being a few examples, but another question which is in the minds of Institute members is why does one hear of the AM's rumblings via Amateur Radio Action, even to the printing of the "most recent DXCC Listing (which wasn't up to date anyway) by the courtesy of the WIA Federal Awards Manager"? Are years of voluntary labour and dedication to the Institute and amateur radio by many going to be swallowed up by a handful of "capitalistic" "journalists"?

It is my belief that the Institute has got three options in dealing with the problems that have developed. They are as follows:—

(1) Carry on as if nothing has happened and allow doubtful operations to be counted. Forget about some of the older participants in the scheme who worked a genuine station in the Call area. (It may have been many years ago but so what?) This course of action is an easy way out and no one will have to do anything, but the Institute will be open to World wide ridicule and this Policy would open to world wide ridicule and this policy would infer that it condones such operations.

(2) Get its act together, bringing it in line with other similar organisations and appoint a Committee of at least five, including at least one Novice operator (they do constitute a sizeable percentage of Full calls), one member to act as Chairman and become Federal Awards Manager. (It is apparent that the responsibility should not be left to any one individual to administer, particularly with some operations in remote areas being planned by "Get rich and get out" operators. Perhaps a likening to the operator who claimed to be on North Cook and as he had a high expenditure and also a "special" QSL card, a donation of two American dollars to a Box number in Raratonga would expedite the much wanted card. One problem, he, whilst supposedly on North Cook, was seen in South Cook and he was a VK2.)

It must be stressed that cards for updating of Credits would have to be examined by the AM or his representative due to the circulation of bogus cards and the submission of similar cards by a prominent DXer for accreditation which led to disqualification from the ARRL. There was no error on Dr. Dave Gardener's part in my book because he did it twice and was expelled before he could resign.

(3) After rehearsing and sorting out the problems as in (2) above, open up WIA DXCC for allcomers. This could be a financial bonanza for the Institute and by creating an external "market" with Associate Membership, a wider circulation of Amateur Radio, which by the few overseas amateurs who have seen it that I have spoken to, regard it as a first class production and are seriously contemplating subscribing. Perhaps there could be some hidden benefits such as prestige, another common talking point on air and some unusual articles being supplied.

With DXCC some stations will go to any length to get an unusual "Certificate" on the wall, this particularly applies to North America and even though the creditable countries may be the same I am sure there would be a market. Some serious thought should be given to establishing some form of DXCC for Novices, as due to their usable spectrum they are disadvantaged and somehow they should be catered for.

I hope the above if nothing else will create a few thoughts from the Executive and enable this situation to be resolved. Whichever course is taken there will always be the disgruntled, however please don't allow the Institute to be the target for adverse criticism from a world wide audience.

(Name and address supplied — withheld by request.) ■

5 Havenvale Crescent, Dianella 6062

The Editor,
Dear Sir,

There appears to be a discrepancy between the Band Plan in the 1981-82 Call Book and what I have believed to be correct. The Call Book finishes the 80m CW only segment at 3535 kHz, whereas the VK2ZIP catalogue uses 3550 kHz. Who is right?

Further on the subject of Gentlemen's Agreements. Like Jerry VK5NRG (AR October 1981, page 48), I have also noticed SSB nets below 21.150 MHz. I disagree with some of his comments and in particular the tone of them. Restricting novices to A1 might reduce the QRM below 21.150 MHz, but it could not eliminate any QRM from full call stations, as VK5NRG seems to imply. I would rather put up with the QRM that VK5NRG complains of (and so it seems would our editor) than the legislative QRM from Canberra. One solution might be for Jerry to get an AOCP and drop below 21.125 MHz.

One problem with the suggestion to keep AOCP stations out of the novice segments would be DX expeditions. Does Jerry feel so strongly about full calls operating in the novice band that he would pass up a QSO with, say, Heard Island, just because the operator there has a full call?

73. Peter Roga VK6PV (ex VK6NRU/ZPR).

The long standing and agreed WIA recommended CW only portion for the 80m band is 3500 to 3535 kHz.—Ed.) ■

HAVE YOU CHECKED YOUR CALL-SIGN IS CORRECT ON YOUR AR ADDRESS LABEL?

Wait for the Tail

"Like I said, Charlie, we've got a great repeater here in Wollongong."

"Yeah, you're right, mate. A good group of blokes and a great set of rules. Unless you work by the rules you don't have a good repeater."

"BREAK."

"Yeah, stand by breaker. That's the ticket, Charlie. Unless you got rules that people work with you don't have a good repeater."

"BREAK."

"Breaker, you've been acknowledged. Boy, some people. By the way breaker, on this repeater you only use 'break' when you have important traffic to pass. Right, Charlie?"

"BREAK, BREAK."

"Yeah, and you only use 'break, break' when you have VERY important traffic."

"And furthermore, breaker, you don't just use 'break'. You're supposed to use your call sign."

"Gentlemen, this is VK2QRM with priority traffic. Is there a base station on frequency?"

"VK2 . . . MRQ, I think it is . . . Victoria Kilowatt Two Mike Radio Quebec? Is that the call?"

"No, Charlie, you've got it wrong. It's Queen Roger Mike. That's what it is, isn't it, breaker?"

"That's a Roger, old man, QRM. Quietly Rolling Merrily. Are you a Base Station? We have a road situation that needs some help."

"Hold on, old man, we do have rules on this repeater and you just broke two of them."

"Sorry about that but there's a fairly big problem on the F6 freeway. Have you got a phone handy?"

"Sure do, I run a first class station here. Anyway the first rule you broke is the use of the word Roger, the handbook says you should use Romeo. I guess you know that but I thought I should bring it to your attention. Second . . . we prefer you to use standard phonetics, not the ones you used. Otherwise you will get some character using 'Always Getting Stoned' or 'Not Tonight Josephine' and junk like that, like on the Chicken Band. Do you Roger that?"

"Yes, that's a QSL. Now about that emergency, could you call the police for me?"

"There you go again, breaking another rule. Maybe you QSL on CW but it's Romeo on phone — You got that?"

"Charlie, you're fantastic, you know all the rules. By the way 10 minutes are up. We better identify. This is VK2QST."

"Thanks for reminding me, mate. This is VK2QRP. Now, breaker, QRM, I think. I didn't write it down. The other thing I wanted to mention is your use of the word emergency. Is this 'emergency' or 'priority'? There's a difference you know!"

"VK2QRP this is VK2QRM. We're on the F6 Freeway, one mile past the Sublime Point turn-off. A car has left the road and hit a tree. Will you call the police and the ambulance?"

"Okay, copied all that. That's a nice sounding rig you got there. What do you reckon, Joe?"

"Sounds a bit over-deviated to me, Charlie. Can you back off the mike gain a bit, QRM?"

"Okay Joe, can either of you call the police station please? There are people in the car and they don't seem to be moving."

"Okay, QRM. Let me find a piece of paper and a pencil and we'll take care of you. Stand by."

"While Joe is looking for a pen, old man, let me remind you to wait for the tail on the repeater. You missed it a few times and you could have timed out the repeater. I know you're new on the repeater and don't know all the rules . . . Just wait for the tail to finish."

"QST is back. Okay QRM, nice and slow now and don't get excited or anything. What's the situation you want to report?"

"On the F6 freeway, north-bound, just north of the Sublime Point turn-off, a car has gone off the road and hit a tree. There are people inside who may need help. QSL? VK2QST from VK2QRM."

"Jeez, there you go again with the QSL stuff."

". . . QRX a minute, 'e's gorn to answer the fone . . . "

Lyrebird, Winter 1981

15,000 licensed amateurs in a population of 15,000,000 is a tiny percentage. One strong voice, the Wireless Institute of Australia, carries weight — much more weight if all amateurs join as members.

"And don't forget, Joe, he doesn't have to ID with both calls, just his own call. Tell him."

"Well you did that pretty well, Charlie, Okay QRM, I know you're new on the repeater and a little excited, so we'll forget it. So, that's on the F6, north-bound, just north of the Sublime Point turn-off. Roger. Are the people in the car injured? I gotta know so we can get an ambulance."

"All right, I'll get out of the car and take a look. I've got a hand-held I can take with me. Stand by."

"Standing by. Hey, Charlie, do we call Bulli cops or the Highway Patrol in Wollongong?"

"Probably the Highway Patrol, you see plenty of them on the expressway."

"QRM back. How's my signal from the hand-held?"

"It's kinda noisy. About 85 per cent quieting. You should try to have a noise free signal into the repeater, not noisy like yours is right now."

"Sorry Joe, but I had to get out of the car to see about the people."

"And you're not waiting for the tail again. Slow down, don't get excited. I know you're not used to handling traffic like this every day, but you've got to stay calm. Can you boost that thing to high power?"

"I think I've got a new battery pack in the car. Shall I go and get it?"

"Might be a good idea. While he's away, Charlie, I don't have a phone book. Can you give me the Highway Patrol number?"

"QRM back. How's the signal now? I've got a new battery pack in."

"100 per cent old man. Now check out car and see if the people in it need an ambulance."

"Hey, Joe, if they need help, what's the number of the ambulance?"

"I don't know, mate. Maybe the police will handle that."

"Gentlemen, the people in the car are injured and need help. VK2QRM here."

"VK2RVA with information."

"Go ahead RVA."

"Just tuned in to the QSO, Joe and Charlie, I've got the ambulance number. What's the problem?"

"Good morning, Ed. We've got VK2QRM on the F6 freeway with a situation that needs to be called in. QRM, do you copy, Ed?"

"Sure do. Ed, can you call in an emergency?"

"Well, hold on a minute. I'd like to help, but first we have some rules on this repeater. First off, you didn't wait for the tail . . ."

WB2RVA in CQ, December 1980. Adapted by VK2DMR from The Propagator. ■

OBITUARIES

HENRY CLEM VK4HC

Henry was born in Ipswich in 1917 and was an active amateur in the years following World War 2.

Ill-health prevented him from participating in amateur radio over the last few years.

For some years Henry was in the retailing business and then joined the Queensland Railways, and later took up his own retail business.

He was well liked for his pleasant and friendly manner and will be missed by his many friends.

His wife predeceased him several years ago, from which Henry never really recovered.

On behalf of the amateur radio fraternity we extend our deepest sympathy to Dennis, Barry, Morrie, Ken and families.

Norm Hart VK4KO. ■

JAMES ALLENBY SCRIVEN ex VK5SN

James Allenby Scriven was an "old-timer" whose AOCP was dated June 1938 and numbered 2142.

Prewar Jim held the call VK5SN. His tragic death at the farewell luncheon of a friend on 3rd December, 1981, terminated a long standing plan to return to the amateur bands. For several years he had been working towards this end with the meticulous thoroughness so characteristic of him.

In 1936 Jim joined the Royal Australian Naval Reserve and was mobilised at the outbreak of war in September 1939. He saw active service on various ships and establishments as a Leading Wireless Telegraphist.

After discharge Jim's innate love of precise things and his flair for craftsmanship led him through watch and instrument making to the airways industry. After a short stint with Australian National Airways, he joined TAA some 24 years ago and was licensed as an Aircraft Maintenance Engineer, Electrical. Before the Douglas DC9 was introduced to Australia he spent some time in the USA.

At all times a loyal supporter of the WIA, Jim was well known in areas where help was needed, such as journal collation. In 1980 he gained first place in the VK5 Receiving Section of the Remembrance Day Contest. He was a member of both the ARRL and AMSAT.

Jim was remarkably well informed on a wide range of subjects and was ever a dependable and supportive friend.

We are poorer for his passing.

Our deepest sympathy is extended to his wife and family.

Staunton McNamara VK5ZH. ■

BRUNO VOSS VK2VRU

It is with regret we announce the passing of Bruno VK2VRU at Sydney's North Shore Hospital on 12th January, 1982, at the age of 47.

Bruno was born in Germany and at the age of ten he was moved from war-torn Hamburg to the countryside and shortly after he was orphaned. He had a very chequered career training as a carpenter, working in coal mines and serving in the French Foreign Legion and upon his discharge migrated to Australia.

Bruno graduated from CB to becoming a novice in 1979 and immediately became an enthusiastic DXer, this being facilitated by his command of three languages, and in the brief period of two years he acquired sixteen awards, including the WIA DXCC.

Bruno's jovial manner as net control will be sadly missed by the members of the Central Coast Amateur Radio Club.

Sincere sympathy is extended to his wife, Juliane, his son, Norbett, and his daughter, Bronwyn, whom he eagerly supported in her athletic prowess.

Submitted by Michael Barry VK2IH. ■

SILENT KEYS

It is with deep regret that we record the passing of —

Mr. F. C. BIBBY	VK3OL
Mr. H. E. CLEM	VK4HC
Mr. F. W. CROPLEY	VK3LR
Mr. R. C. PAGE	VK2KCF
Mr. JAMES ALLENBY SCRIVEN	ex VK5SN
Mr. W. G. SMITH	VK2WH
Mr. R. TURNER	VK5ART
Mr. H. B. VOSS	VK2VRU
Mr. F. C. WESTON	VK5APW

FRANK WESTON VK5APW (ex 2APW)

Frank passed away very suddenly, but peacefully, on 13th January, 1982.

Frank was born in India in 1919. He joined the RAF mid-1940 and was discharged in December 1947 with the rank of Acting Sergeant.

He saw active service during World War II and the fall of Burma found him stationed at Lashio. With 130 other RAF personnel he walked out of Burma into Chantu, in China. He was posted missing for nine months during which time Frank and his mates begged, borrowed and even stole parts to make their own radio. They tried to make contact using the old RAF code, which had since been changed, and it took several weeks to convince the RAF in India that they were who they were. When headquarters records finally proved they were missing arrangements were made to fly them to Chungking, then back to India to Headquarters Command, South-East Asia, where Frank saw out the rest of the war.

Upon his discharge from the RAF Frank joined the Marconi International Marine Communication Company as a sea-going Radio Officer, during which time he was involved in transporting the first troops of the United Nations to Korea and the evacuation of the Dutch out of Indonesia.

He gave up the sea in 1953 and joined the Ministry of Civil Aviation in London and remained there until he emigrated to Australia in 1956. He spent a short time working for the Ionospheric Prediction Service and the ABC before he joined the Department of Civil Aviation in 1960 as a Radio Technician at the Radio Workshops at Marrickville, NSW, where he remained until ill-health forced an early retirement in 1976.

Frank retired to Dunbogan, NSW, until 1980, he then moved to South Australia as he was advised the drier climate there would prolong his life. Amateur radio, particularly chasing the elusive DX and rag-chewing with his many new and old friends, certainly helped in this cause also.

Frank was always the perfect gentleman both on air and off, fondly remembered by his former workmates as a very conscientious, amiable, considerate and helpful friend. His cheery, friendly disposition, despite failing health, won him many friends and he will be sadly missed, particularly on the Pacific DX net.

To his devoted XYL Olive and son Stephen we extend our deepest sympathy.

Submitted by Harry VK4OX. ■

HAMADS

- Eight lines free to all WIA members. $9 per 10 words minimum for non-members.
- Copy in typescript please or in block letters to P.O. Box 150, Toorak, Vic. 3142.
- Repeats may be charged at full rates.
- Closing date: 1st day of the month preceding publication. Cancellations received after about 12th of the month cannot be processed.
- QTHR means address is correct as set out in the WIA current Call Book.

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Shack Clearance: Kenwood TS180S, PS 30, AT 180, VFO 180, SP 180, MC 50, with 2nd filter, $1690, ONO; Kenwood 520S with DC/DC converter and 27 MHz, $540, ONO; Yaesu FT301, AM, FSK, SSB, with FP 301 power supply/speaker, 27 MHz, $760; System 80 computer with software, little use, $650, ONO; all equipment in excellent order. Danny. Ph. (02) 599 2381.

Kenwood TS520S, novice power, only one final valve, in good cond., $425. VK4NJF, QTHR. Ph. (071) 72 4932 Bundaberg.

Icom 22A 2m Txcvr., all popular repeaters and simplex channels, car mount, manual, mic., all in excellent cond. Barry VK2DLI. Ph. (049) 32 8291.

Yaesu FT101E Txcvr., good cond., complete with mike and manual, $450, ONO. VK4WIT. Secretary, PO Box 964, Townsville 4814.

IC-202 2m SSB Txcvr., exc. cond., still in orig. packing, all acc., incl. 144.6-144.8 MHz xtal, will consider any offer, asking $140. Neil VK3AQD. Ph. 459 6445.

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Uniden 2020 and external VFO, 12V mobile lead, handbooks and complete service manual, v.g.c. cond., $520, ONO; Yaesu FT224 2m FM 10W txcvr., with instruction manual, mounting bracket, R2 to 8, S40, 50, 51, v.g.c. cond., $150. Rob VK3ZVN/NAW, QTHR. Ph. (03) 435 4112.

Kenwood TS520S, near new, incl. Swan mic., $520. Frank VK3BPV. Ph. (03) 725 9677 or (03) 723 4634 AH.

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Kenwood TS830-S Txcvr., with MC35 mic. and handbook, AT200 antenna tuner, SP-180 external spkr., with filters, as new cond., and to be sold as a unit, $1100. Ph. (063) 62 5346 AH.

FT2FB 2m FM Mobile with 8 channels plus spare xtals, $150; IC202 2m SSB portable with Oscar xtal, $150. Geoff VK4KGE, QTHR. Ph. (071) 62 1877 or (071) 62 1282.

Icom IC701, late fact. N/B, fan mods., mic., as new, carton, manuals, $700; Kenwood TS180S DFC, dual filters, as new, carton, manuals, $850; Kenwood TV502 2m t/verter, modified for use with TS180, $120; Kenwood SM220 station monitorscope, as new, carton, manuals, pan adaptor, $225; FDK 6 ch. (multi-palm), h/held, case, charger, xtals, complete, $140; Centronics P1 printer, suit computer or RTTY printout, $350. Ph. (02) 57 4648.

Kenwood TV506 6m Transverter, suit Kenwood, Yaesu, Icom, $150. Dale VK4KDM, PO Box 54, Weipa, FNQ. 4874. Ph. (070) 73 3528.

Drake SSR1 Rcvr., $195; Mizuho DX555D freq. counter/gen., $195; Hansen ZQM2 transistor tester, $20; Sanwa A303TRD multimeter, 20K OPV, $20; Katsumi EK9M ele-key, $20; Lafayette reg., pwr. supply 5-20V 2A twin meters, $75, all exc. cond., with instructions, prices inc. p.p. VK3IB, QTHR. Ph. (053) 89 1791 BH.

TS520S HF Transceiver, incl. CW filter, mic., and well documented home made equivalent of DG-5 frequency counter, little used, exc. cond., $500. VK2BMZ. Ph. (02) 86 2990.

Icom 720A Full Range Txcvr., with AM and CW filters, Icom PS20, 240V/12V, 20A power supply, Fritzel type GPA 30 vertical antenna for 10, 15 and 20m, all above are brand new, unused, in orig. cartons, new price $1700, sell $1250. Steve Shanasy. Ph. (03) 699 5483 or (03) 25 6758.

WANTED

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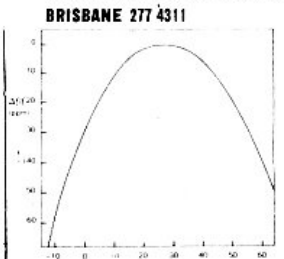

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1.	Nominal Frequency	32.768 KHz
2.	Frequency Tolerance	+30 ppm/28° +1°C
3.	Drive Level	1uW max.
4.	Series Resistance	31.0 kOhms max.
5.	Q Factor	40.000 min.
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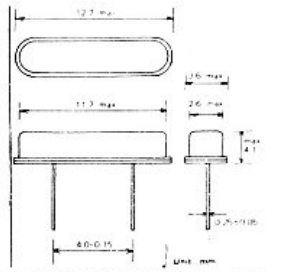

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